

MONTHLY LABOR REVIEW

UNITED STATES DEPARTMENT OF LABOR • BUREAU OF LABOR STATISTICS

***** + HUGH S. HANNA, EDITOR + *****

CONTENTS

SEPTEMBER 1942, Vol. 55, No. 3

Special articles:

Page

Income and spending and saving of city families in wartime.....	419
Maritime labor force in the United States.....	435
Employment of women in wartime.....	441
Effect of the war on textile employment.....	446

Wartime policies:

Recommended optimum hours for maximum production.....	459
Manpower control to prevent "pirating".....	460
Labor policy for Government plants.....	462
Policy of nondiscrimination in employment of aliens.....	465
Canadian wage and cost-of-living order of July 1942.....	466

Employment and labor conditions:

Company policies on military and civilian service of employees.....	473
Legal restrictions on employment of aliens in Paraguay, 1942.....	477

Social security:

Unemployment-compensation operations, first half of 1942.....	478
Changes in French social-insurance system.....	479

Employment offices:

• Placement work of United States Employment Service, first half of 1942.....	482
-------------------------------------------------------------------------------	-----

Industrial relations:

Decisions of National War Labor Board, May-July 1942.....	484
Organization of United Steelworkers of America.....	497

Health and industrial accidents:

Industrial injuries in the United States during 1941.....	501
Lengthened life span of printers.....	527

Court decisions:

Labor decisions of the Supreme Court, 1940 and 1941 terms.....	530
----------------------------------------------------------------	-----

Cooperation:

Operations of credit unions in 1941.....	540
The cooperative movement and the war.....	547

Cost of living:

Changes in cost of living, July 15, 1942.....	567
Estimated intercity differences in cost of living, June 15, 1942.....	570

Industrial disputes:

Recent strikes.....	574
Activities of the United States Conciliation Service, July 1942.....	575

Wage and hour statistics:

Earnings in manufacture of oil-field machinery, February-March 1942.....	578
Wage-rate changes in United States industries.....	585
Great Britain—Earnings of workers in January 1942.....	587
New Zealand—Wartime wage increases.....	590

Wage and hour regulation:

	Page
Minimum rates under Fair Labor Standards Act:	
40-cent wage for leather-goods, etc., industry.....	594
40-cent rate for cigar makers and 35-cent rate for cigar leaf-tobacco handlers.....	594
40-cent rate for cigarette and tobacco industry.....	594
Minimum rates under Public Contracts Act:	
40- and 50-cent rate for wood furniture and public seating industries.....	595
Minimum sugarcane wage rates in Virgin Islands.....	595

Labor turn-over:

Labor turn-over in manufacturing, June 1942.....	596
--------------------------------------------------	-----

Building operations:

Estimated construction activity in continental United States, 1939-42.....	601
New dwelling units in nonfarm areas, first half of 1942.....	606
Summary of building construction in principal cities, July 1942.....	612

Retail prices:

Food prices in July 1942.....	615
Coal prices in June 1942.....	622

Wholesale prices:

Wholesale prices in July 1942.....	624
------------------------------------	-----

Trend of employment and unemployment:

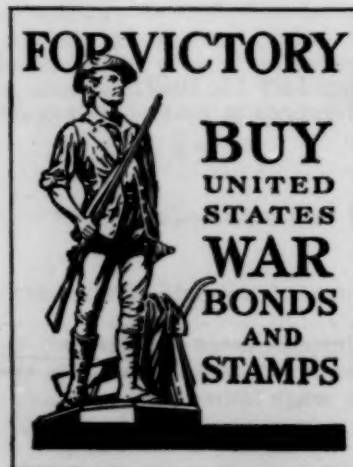
Summary of reports of employment for July 1942.....	629
Detailed reports for industrial and business employment, June 1942.....	633
Employment and unemployment in July 1942.....	646

Labor conditions in Latin America

477

Recent publications of labor interest

648



OCT 6 '42

Changes in income and saving of city families in 1942.

Incomes of city consumers rose some 7 percent between the year 1941 and the first quarter of 1942, but their average expenditures for current consumption increased less than 2 percent. As during the same period, living costs went up 7.5 percent, American city families were actually buying a smaller quantity of goods and services in the first quarter of 1942 than in 1941, while the rate of savings of these families increased about 70 percent. Page 419.

Maritime labor force in the United States.

About seven-tenths of the men who held licenses or certificates qualifying them to make voyages either on the Great Lakes or in salt water failed to make a trip between August 1940 and August 1941, although large numbers of them were undoubtedly engaged in full-time employments on land. This condition applied to the licensed officers as well as to the ordinary seamen. Also, large proportions of those who had been employed aboard ship during the period noted were so employed only part of their time and many others were working below the occupational level at which their training and work experience lawfully enabled them to engage. Page 435.

Effect of the war on textile employment.

The textile industries have thus far suffered only a slight decline in employment because of wartime conditions. However, employment decreases are expected to become more marked as fabric inventories are depleted and curtailed production of fabrics for civilian use takes effect. By the fourth quarter of 1942 total textile employment, it is estimated, will be about 5 percent below the 1941 peak. The greatest reduction is anticipated in women's wear plants, which to date have received little Government work. Page 446.

Employment of women in wartime.

According to a recent survey by the WPA the employment of women in the United States has been increasing at a faster rate than that of men, the report indicating that during the year ending with May 1942 the number of women employed rose by 1,700,000, whereas for men the corresponding figure was 1,400,000. When the manufacturing industries only are considered, the reverse is true. Thus, data collected by the Bureau of Labor Statistics show that in the year ending in April 1942, although nearly 200,000 additional women had been employed, this represented an increase of only 8 percent as compared with 12 percent for men. The situation in individual manufacturing industries varied considerably. In the metalworking industries there was practically no change over the 3-year period from 1939 to 1942. In these industries women constituted a much smaller proportion of the total working force than was shown by manufacturing generally. Page 441.

Industrial injuries increase in 1941.

The frequency rate of industrial accidents was 14 percent higher in 1941 than in 1940. This increase is attributable to the influx of a large number of inexperienced workers into the rapidly expanding war industries, the crowding of workers in war plants, and the failure of safety activities to keep fully abreast of the war program. It is estimated by the Bureau of Labor Statistics, as the result of a comprehensive inquiry, that in the year 1941 there were 2,180,200 industrial injuries due to accident, of which 19,200 resulted in death, 100,600 in permanent impairments, and 2,060,400 in temporary disability of 1 day or more. Page 501.

Credit unions in 1941.

Loans of credit unions to their members in 1941 totaled nearly \$363,000,000. This was an increase of 18.6 percent over 1940. In the same period the number of credit unions increased 10.0 percent, the membership rose 25.2 percent, and there was a gain in assets of 27.6 percent. Page 540.

Increased life span of printers.

A half century ago the average life span of a printer was only about 40 years. Today, the average printer is expected to live to the age of 64 or 65 years. These figures are from the records of the International Typographical Union, which attributes this great increase in the life expectancy of printers, in large part, to shorter working hours and better working conditions generally. Page 527.

British wages, January 1942.

Earnings of wage earners in Great Britain and Northern Ireland increased from a weekly average of 53s. 3d. in October 1938 to 77s. 9d. in January 1942, or by 46 percent. The January 1942 survey of earnings is the latest of four made to obtain information on the wartime trend of workers' earnings, including bonus and overtime pay. The rate of increase slackened from July 1941 to January 1942 when the rise was 2.5 percent, compared with 29.9 percent from October 1938 to July 1940. Earnings of boys have risen more rapidly than those of any other class of workers, and those of men have come next. Among the 16 industries represented in the Ministry of Labor studies, metal, engineering, and shipbuilding showed the sharpest advance in earnings, amounting to 55.9 percent from October 1938 to January 1942. Page 587.

MONTHLY LABOR REVIEW

FOR SEPTEMBER 1942

INCOME AND SPENDING AND SAVING OF CITY FAMILIES IN WARTIME ¹

Summary

THE present war has not brought boom spending and "silk-shirt" prosperity to the average city consumer² in the United States. Although the income of city consumers rose over 7 percent between the year 1941 and the first quarter of 1942, their average expenditures for current consumption increased less than 2 percent. At the same time living costs went up 7.5 percent. Thus, in the first 3 months after the attack on Pearl Harbor, American city consumers were buying a smaller quantity of goods and services.

The conversion of American industry to war production was reflected in increases in money income of 5 percent or more between the two periods, for nearly half the urban consumers in the United States. For this group, income increased enough to offset the increase of 7.5 percent in living costs.³ Over one-fifth had increases that amounted to 25 percent or more. On the other hand, priority unemployment, business losses, and other factors caused decreases in income of 5 percent or more for another fifth of the consumers.

One-half of the city consumers had annual cash incomes below \$1,857 in 1941 as compared with \$1,982 in 1942. Single persons, comprising over one-sixth of all consumers, were much more heavily concentrated at the low income levels than were families of two or more. In 1942, 54 percent of the single persons and 15 percent of the families had incomes at an annual rate of less than \$1,000.

Relatively full employment and the higher wages meant great improvement in incomes as compared with 1935-36. In that year half the urban families of two or more persons had money incomes below \$1,295 as compared with \$2,215 in 1942. The proportion of families having cash incomes below \$1,000 was more than twice as large in the mid-thirties as in 1941 and the winter of 1942. The average increase in income more than balanced the 15-percent rise in living costs from 1935-36 to 1942.

Supplementary income in the form of goods and services received as pay, as gift, or as relief was relatively important at the low income levels. The occupancy value of owned homes also represented additional income to a large number of families, especially at the high

¹ Prepared by Alice C. Hanson, Jerome Cornfield, and Lenore A. Epstein, of the Bureau's Cost of Living Division, Faith M. Williams, chief.

² The term "consumer" is used to include both families of two or more persons and single consumers. Nearly five-sixths of the consumers were families of two or more. In this article the terms "single persons" and "single consumers" are used synonymously.

³ Based on a comparison of the Bureau's index of the cost of goods purchased by wage earners and lower-salaried workers in the United States averaged for the year 1941 and for the first quarter of 1942.

income levels. Supplementary income in 1942 was important enough, when added to money income, to shift over one-fifth of all families and single consumers living in cities into a higher income class.

Savings of the average city consumer were 70 percent higher in the first 3 months of 1942 than in the preceding year. In 1942, 11 percent of total money income went into savings as compared with 7 percent in 1941. Consumers whose incomes did not change saved half again as much in 1942 as they saved in an average quarter of 1941. Those with substantially higher incomes saved very much more than in the preceding year. Those who had suffered reductions in income ran into debt in the later period, but they were relatively few in number. The general increase in savings was so large that it represented over two-thirds of the increase in total consumer incomes. Increases in assets and decreases in liabilities made up these increased savings, as well as income taxes paid in advance of due date. War bond and stamp purchases formed a large part of the savings.

For low-income consumers, the winter of 1942 brought a large increase in debt. Increased living costs explain in part their greater difficulty in making ends meet. Thus, fixed-income consumers in the classes below \$1,500 spent 7 percent more than in 1941. In addition there was a large number to whom 1942 meant sharply decreased incomes. Food, housing, and medical care accounted for practically the entire rise in expenditures for these groups. In contrast, higher-income city consumers (those with incomes above \$1,500) spent less for consumption and saved more in 1942 than those with incomes of that amount in 1941.

With new cars and tires rationed, expenditures of the average city consumer for buying and running automobiles were much lower in 1942 than in 1941. Outlays for household furnishings and durable equipment such as stoves and refrigerators were also lower. The only expenditures of the average consumer that showed notable increases in average amount between 1941 and 1942 were for food, fuel, and medical care. Families usually spend more for medical care and fuel in winter time. Food prices, however, had advanced 11 percent between 1941 and the first quarter of 1942, while expenditures for food went up only 5 percent. This meant that city consumers were buying less food or the cheaper foods in the first 3 months after the declaration of war.

These findings come from the Survey of Family Spending and Saving in Wartime conducted by the Bureau of Labor Statistics among a cross section ⁴ of all city consumers—families and single persons. It was paralleled by a survey of rural consumers by the Bureau of Home Economics of the United States Department of Agriculture. These form the first Nation-wide study of incomes and expenditures since the Study of Consumer Purchases covering 1935–36. The consumers were interviewed in their homes by trained field agents, using a detailed schedule that covered sources of income, amounts spent for food, clothing, housing, transportation, and all other items entering into current family living, as well as net change in family assets and liabilities. From most consumer units, the information was obtained for both the year 1941 and the first quarter of 1942.

⁴ A reprint of the present article will contain an appendix giving a detailed discussion of the order of accuracy of the sample and the methods by which it was drawn.

The lower the income level in 1941, the larger was the proportion of consumers whose incomes rose 25 percent or more between 1941 and 1942. This was to be expected, because part-time employment or unemployment for some members of the family was a frequent cause of low income in 1941. Full-time employment in 1942 for such persons would result in a large percentage increase in family income. Comparatively few of the high-income families in 1941 had unemployment, and at their income levels it is not common to have an opportunity to move to a job that within the year pays 25 percent more than the job previously held.

Income of All Consumer Units

MONEY INCOME

Half the families and single persons living in cities had money incomes at the annual rate of \$1,982 in the first 3 months of 1942 as compared with \$1,857 or less in 1941 (table 1 and chart 1). In both periods, 8 percent of all urban families and single persons had cash incomes below \$500. Annual incomes of \$3,000 or more, however, were reported by 23 percent of the families in 1942 as compared with only 19 percent in the preceding year.

TABLE 1.—Percentage Distribution of City Families and Single Persons by Money Income, 12 Months of 1941 and First 3 Months of 1942

Annual money income class ¹	12 months of 1941			First 3 months of 1942 (annual rate)		
	Families plus single persons	Single persons ²	Families of 2 or more persons ³	Families plus single persons	Single persons ²	Families of 2 or more persons ³
Under \$500.....	8	29	4	8	27	4
\$500 and under \$1,000.....	15	34	11	14	27	11
\$1,000 and under \$1,500.....	15	19	14	14	21	12
\$1,500 and under \$2,000.....	16	9	18	15	11	16
\$2,000 and under \$2,500.....	15	5	17	15	9	17
\$2,500 and under \$3,000.....	12	3	14	11	4	13
\$3,000 and under \$5,000.....	14	1	16	17	1	20
\$5,000 and over.....	5	(4)	6	6	(4)	7
Total.....	100	100	100	100	100	100
Median income.....	\$1,857	\$817	\$2,083	\$1,982	\$918	\$2,215

¹ For 1942, annual rate of money income was based on first 3 months.

² A single consumer, as defined in this survey, is a person who does not pool his income and expenditures with anyone else. He may be married or single.

³ A family, as defined in this survey, consists of two or more persons who pool their incomes and expenditures. They need not be related nor do they necessarily share the same household although such instances are infrequent.

⁴ Less than half of 1 percent.

More significant is the fact that decreases of income were more common among the group with incomes of more than \$3,000 in 1941 than among those with lower incomes. It is to be noted that at all income levels below \$3,000 about 1 out of 5 consumers suffered at least a 5-percent loss of income from 1941 to 1942. Above this level, however, nearly 1 out of 3 faced such a decline and 1 out of 10 a decrease of more than 25 percent. This may not mean that there was more job loss among the higher-income group, but probably does mean that it is harder for persons displaced at the \$3,000 income level to find employment producing equivalent income than for those displaced at the \$1,500 level.

TABLE 2.—Comparison of Money Incomes of City Families and Single Persons, in 12 Months of 1941 and First 3 Months of 1942, by 1941 Money Income Class

Annual money income class in 1941	Percent of families reporting annual rate ¹ of 1942 income					
	Total	Higher than in 1941 by—		Within 5 percent of 1941 income	Lower than in 1941 by—	
		25 percent or more	5 to 25 percent		5 to 25 percent	25 percent or more
All incomes.....	100	22	27	29	14	8
Under \$1,000.....	100	29	24	27	10	10
\$1,000 and under \$2,000.....	100	25	29	27	11	8
\$2,000 and under \$3,000.....	100	18	30	31	15	6
\$3,000 and over.....	100	17	21	31	21	10

¹ For 1942, annual rate was based on first 3 months.

As a result of income shifts, some of the \$1,000 consumers in 1941 became \$1,500 consumers; some of those in the \$1,500 income class in 1941 fell in the \$1,000 class in 1942 (table 4). It is well, therefore, to consider what the income status in 1941 was for families and single persons now making \$1,000 or \$2,000 or \$3,000, as the case may be (table 3). It will be seen, for example, that nearly 1 in every 3 with an income of less than \$1,000 in 1942 had suffered a decline of 5 percent or more in income. On the other hand only about 1 in every 8 of those with \$3,000 or more in 1942 had had an income reduction of 5 percent or more. Nearly 2 out of 3 of the consumers with \$3,000 or more in 1942 had had an increase of income, while only 2 out of 5 of those with incomes of less than \$1,000 were better off in 1942 than in 1941. Thus, it is not to be assumed from the discussion of table 2 that the average consumer at low income levels is better off in 1942 than in 1941.⁵

TABLE 3.—Comparison of Money Incomes of City Families and Single Persons, in 12 Months of 1941 and First 3 Months of 1942, by 1942 Money Income Class

Annual money income class in 1942 ¹	Percent of families reporting annual rate of 1942 income					
	Total	Higher than in 1941 by—		Within 5 percent of 1941 income	Lower than in 1941 by—	
		25 per- cent or more	5 to 25 percent		5 to 25 percent	25 per- cent or more
All incomes.....	100	22	27	29	14	8
Under \$1,000.....	100	15	23	30	14	18
\$1,000 and under \$2,000.....	100	21	27	29	15	8
\$2,000 and under \$3,000.....	100	21	28	33	14	4
\$3,000 and over.....	100	33	30	24	10	3

¹ For 1942, annual rate was based on first 3 months.

⁵ The distinction between tables 2 and 3 is of extreme importance in considering a tax program. There is presumably a larger taxpaying capacity in a family that customarily had an income of \$1,200 but now has an income of \$1,500 than in a family that has characteristically had about \$1,500 and still has. Table 2 shows that about half the families had substantially more income in 1942 than in 1941 and that increases were especially frequent among families that had had less than \$2,000 income. Table 3 indicates that the group with less than \$1,000 consists of about equal numbers of families with more income than in 1941, with the same income, and with less income. In other words, as a group its taxpaying capacity is about the same as in 1941. On the other hand, the taxpaying capacity of the group with incomes of \$2,000 to \$3,000 in 1942 is larger than in 1941 because it contains 5 families with larger incomes than in 1941 for every 2 whose incomes are smaller.

TABLE 4.—Comparison of Money-Income Distribution of City Families and Single Persons in 12 Months of 1941 and First 3 Months of 1942

Annual money income class in 1941	Total	Annual money income class in 1942 (based on first 3 months)					
		Under \$500	\$500-\$1,000	\$1,000-\$1,500	\$1,500-\$2,000	\$2,000-\$3,000	\$3,000 and over
Under \$500.....	100	78	16	5	(1)	1	(1)
\$500 and under \$1,000.....	100	9	66	18	5	2	(1)
\$1,000 and under \$1,500.....	100	2	10	52	27	8	1
\$1,500 and under \$2,000.....	100	1	1	11	50	35	2
\$2,000 and under \$3,000.....	100	(1)	1	2	7	63	27
\$3,000 and over.....	100	(1)	(1)	(1)	(1)	13	85

¹ Less than half of 1 percent.

TOTAL INCOME (INCLUDING INCOME IN KIND)

In addition to cash incomes, many families and single persons received supplementary income in the form of home-produced food and food, rent, clothing, or household furnishings as pay, as gift, or from a relief agency. In addition, home owners were credited with income representing the occupancy value of their homes, that is, the difference between the market rental value of the dwelling and the actual expenses incurred for taxes, repairs, insurance, and interest on mortgages.

Income in kind was particularly important at the low-income levels, comprising about half again as much as money income, on the average, for families and single persons with money incomes below \$500, and over one-sixth as much for those in the next higher income class (table 5). Domestic servants, janitors, institutional and other employees who customarily receive food or lodging as pay and relief recipients are concentrated in these income groups. At the upper income levels noncash income, consisting principally of the occupancy value of owned homes, averaged larger in amount but was relatively unimportant in relation to cash income.

TABLE 5.—Average Money and Other Income of City Families and Single Persons by Money Income Class, 12 Months of 1941 and First 3 Months of 1942

Annual money income class	12 months of 1941			First 3 months of 1942		
	Average money income	Average value of goods and services received without direct expense	Average total ¹ income	Average money income	Average value of goods and services received without direct expense	Average total ² income
All incomes ¹	\$2, 188	\$159	\$2, 347	\$587	\$40	\$627
Under \$500.....	307	144	451	75	40	115
\$500 and under \$1,000.....	743	134	877	182	32	214
\$1,000 and under \$1,500.....	1, 246	123	1, 369	312	33	345
\$1,500 and under \$2,000.....	1, 750	137	1, 887	436	33	469
\$2,000 and under \$2,500.....	2, 240	158	2, 398	556	35	591
\$2,500 and under \$3,000.....	2, 742	175	2, 917	685	38	723
\$3,000 and under \$5,000.....	3, 732	202	3, 934	932	47	979
\$5,000 and under \$10,000.....	6, 208	247	6, 455	1, 615	77	1, 692

¹ For 1942 annual rate of money income was based on first 3 months.² Money income plus other income.³ Includes families with incomes of \$10,000 and over.

When income in kind is added to the money income of each consumer unit reporting some noncash income in 1942, 22 percent fall into a higher income class than when money income alone is considered. Some at each level move into a higher class (table 6 as compared with table 1).

TABLE 6.—Percentage Distribution of City Families and Single Persons by Total Income, 12 Months of 1941 and First 3 Months of 1942

Annual total income class ¹	12 months of 1941	First 3 months of 1942 (annual rate)
Under \$500.....	6	5
\$500 and under \$1,000.....	14	14
\$1,000 and under \$1,500.....	15	13
\$1,500 and under \$2,000.....	16	15
\$2,000 and under \$2,500.....	14	15
\$2,500 and under \$3,000.....	12	11
\$3,000 and under \$5,000.....	17	20
\$5,000 and over.....	6	7
Total.....	100	100
Median income.....	\$1,960	\$2,108

¹ Money plus income in kind.

² For 1942, annual rate of income was based on first 3 months.

Income of Families and Single Persons

MONEY INCOME

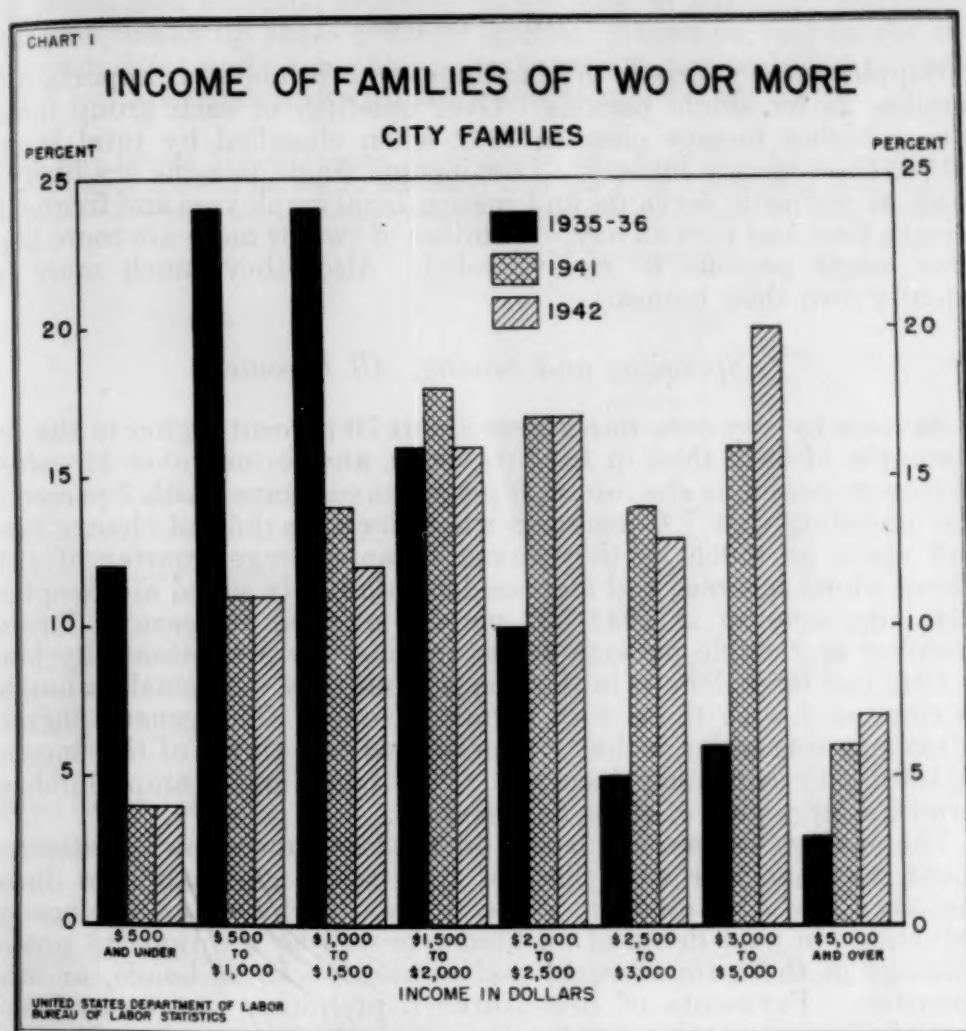
Over one-sixth of the consumers living in cities in 1941 and the winter of 1942 were single persons. They were much more heavily concentrated in the low-income classes than were families of two or more. However, low-income single persons appear to have benefited more than low-income families by the conversion of industry to a war basis.

In both periods, 15 percent of the families of two or more had money incomes below \$1,000 per year (table 1), and approximately the same proportion (28 and 27 percent) of single persons had incomes of less than \$500 in each period. Incomes of \$500 to \$1,000, however, were reported by 34 percent of the single persons in 1941 as compared with 27 percent in 1942.

Half the city families had money incomes at the rate of \$2,215 per year or more in 1942 as compared with \$2,083 in 1941. The median income of the single persons increased from \$817 in 1941 to \$918 in 1942.

Changes as compared with 1935-36.—Striking as are the changes in income between 1941 and the first quarter of 1942, the improvement between 1935-36 and the more recent periods is much more impressive. In the period immediately following the depression half of the urban families of two or more are estimated to have had cash incomes below \$1,295, as compared with the median annual income of \$2,083 in 1941 and \$2,215 in 1942. These figures must be compared, however, with a change in living costs of 7.1 percent from 1935-36 to 1941 and 15.2 percent from the former period to the first quarter of 1942.⁶ Under

⁶ Based on a comparison of the Bureau's index of the cost of goods purchased by wage earners and lower-salaried workers in the United States averaged for the 12 months, July 1935 through June 1936, for the 12 months of 1941, and for the first 3 months of 1942.



conditions of relatively full employment at higher wages, 15 percent of all families of two or more had cash incomes below \$1,000 whereas in the mid-thirties 36 percent had less than that amount. At the other extreme, the 22 percent and the 27 percent having incomes of \$3,000 or more in 1941 and 1942, respectively, are in contrast to the 9 percent with such incomes in 1935-36 (table 7).

TABLE 7.—Percentage Distribution of City Families of Two or More Persons by Money Income¹, 12 Months 1935-36

Annual money income class in 1935-36	Families of 2 or more persons
Under \$500.....	12
\$500 and under \$1,000.....	24
\$1,000 and under \$1,500.....	24
\$1,500 and under \$2,000.....	16
\$2,000 and under \$2,500.....	10
\$2,500 and under \$3,000.....	5
\$3,000 and under \$5,000.....	6
\$5,000 and over.....	3

¹ Based on data in the National Resources Planning Board publication: Family Expenditures in the United States (tables 20, 87, and 182). The total income distribution was adjusted to a money-income basis by deducting imputed income of home owners. Estimates of the frequency of home ownership among relief families were based on original data from the Consumer Purchases Study.

TOTAL INCOME

Supplementary income in kind appears to be about as important for families as for single persons. Over one-fifth of each group moved into a higher income class in 1942 when classified by total income rather than money income. Low-income single persons are likely to work as domestic servants and institutional employees and frequently receive food and rent as pay. Families of two or more are more likely than single persons to receive relief. Also, they much more frequently own their homes.

Spending and Saving, All Incomes⁷

Savings by city consumers were about 70 percent higher in the first 3 months of 1942 than in 1941 (table 8), and formed over 11 percent of money income in the 3-month period as compared with 7 percent in the preceding year. Consumers whose incomes did not change saved half again as much as they saved in an average quarter of 1941. Those whose incomes had increased substantially saved an exceptionally large amount in 1942—57 percent of their increase in income. Families and single persons whose incomes were substantially lower in 1942 had large deficits in that period, but they were small in number as compared with those with higher incomes. The general increase in savings was so large that it represented two-thirds of the increase in total city consumer incomes. War bond and stamp purchases formed a large part of these new savings.

The savings figures are based on the consumers' own statements about net change in each class of their assets and liabilities during the year and the quarter, respectively. Included as savings are reductions in past debts of all kinds, as well as additions to present holdings in the form of cash, real estate, stocks or bonds, or other securities. Payments of life-insurance premiums are treated as a part of savings, as are payments on principal of mortgage or improvements on homes or other real estate owned by the family, and contributions for old-age and unemployment insurance paid by the individual. Savings also include advance payments on Federal income tax (that is amounts actually paid in excess of the one-fourth of the year's tax on 1941 income which was due during the first quarter). To the extent that families were cutting down on their consumption during the first quarter in order to meet their advance tax payments, the level of savings for the remainder of the year may be expected to be somewhat lower. Deficits include increases in balances owing on installment and other credit accounts, in amounts owed to banks, loan companies, etc., amounts due in taxes, and net amounts received from sale of holdings.

Personal-tax payments, averaging \$22 for the entire year, took only 1 percent of the cash income of the average city consumer in 1941. In the first 3 months of 1942 such taxes amounted to \$16 (\$64 per year), or 2.7 percent of income. Federal and State income taxes,

⁷ Averages for all families do not represent the saving or consumption of "typical" Americans, or of any identifiable group, since they are merely an arithmetic average of the spending of the rich and the poor as well as those in the middle-income classes and of single consumers as well as families. Although the average spending of each income class is weighted by the proportion of all consumers in that class, in arriving at the general average, the large amounts spent and saved by high-income consumers give each of these few consumers a much heavier influence upon the average amounts than each of the many consumers at the lower end of the income scale. However, such general averages provide a useful cross-section picture for the particular period to which they refer.

poll taxes, and personal-property taxes, due in January, February, or March, make up these average figures. Taxes on real estate and on automobiles and excise and sales taxes are not included in these figures but are combined with the items to which they apply.

TABLE 8.—Average Money Income, Expenditures, and Savings of City Families and Single Persons During 12 Months of 1941 and First 3 Months of 1942

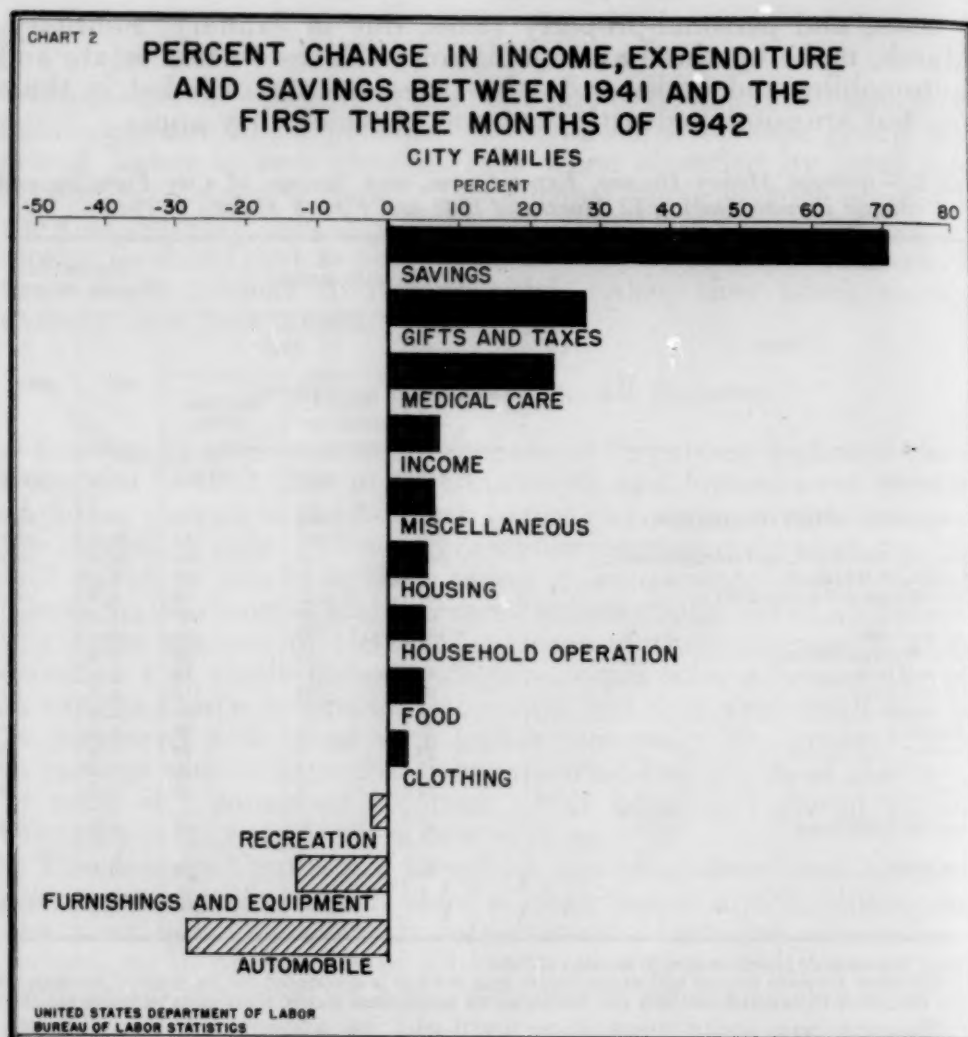
Item	Average amount			Percent of money income ²	
	1941, 12 months	1942		1941	1942
		First 3 months	Annual rate ¹		
Money income.....	\$2,188	\$587	\$2,348	100.0	100.0
Expenditures for current consumption.....	1,938	492	1,968	88.6	83.7
Food.....	612	161	644	28.0	27.5
Housing, fuel, light, and refrigeration.....	363	96	384	16.6	16.4
Household operation.....	95	25	100	4.3	4.2
Furnishings and equipment.....	101	22	88	4.6	3.7
Clothing.....	230	59	236	10.5	10.1
Automobiles.....	184	33	132	8.4	5.7
Other transportation.....	43	11	44	2.0	1.8
Personal care.....	43	11	44	2.0	1.9
Medical care.....	91	28	112	4.1	4.7
Recreation.....	82	20	80	3.8	3.4
Tobacco.....	42	11	44	1.9	1.8
Reading.....	20	5	20	.9	.9
Education.....	17	5	20	.8	.8
Other.....	15	5	20	.7	.8
Gifts and contributions.....	97	22	88	4.4	3.8
Personal taxes.....	22	16	64	1.0	2.7
Savings.....	157	67	268	7.2	11.3

¹ Annual figures were based on first 3 months of 1942.

² The difference between income and expenditures plus savings is accounted for by minor discrepancies in figures furnished by families and in a few instances by nonincome funds, such as inheritance received by families.

Gifts to persons and contributions to relatives and to welfare, religious, and war-relief organizations were over four times as important as tax payments in the case of the average city consumer in 1941. In the winter of 1942, however, such gifts and contributions amounted to only slightly more than tax payments and, when estimated on an annual rate, were somewhat smaller than in 1941. This undoubtedly reflects the fact that personal gifts are largely concentrated at the Christmas season and that community-chest drives in most cities are held in the fall.

The only expenditures of the average consumer that showed notable increases in average amount between 1941 and 1942 were food, fuel, and medical care. Families usually spend more for medical care and fuel in winter time. Food prices, however, had advanced 11 percent between 1941 and the first quarter of 1942, whereas expenditures for food went up only 5 percent. This means that families and single persons were buying less food or cheaper food in 1942 than in 1941. With new cars and tires rationed, expenditures for buying and running automobiles were much lower in 1942 than in 1941. Outlays for household furnishings and durable equipment, such as stoves and refrigerators, were also lower.



Spending and Saving, by Income Level

When savings of consumers at different income levels (table 9) are compared, deficits at the lower income levels give way to progressively larger savings at the higher income levels. This was true both in 1941 and the first part of 1942, although in the later period both extremes were accentuated; deficits at low levels were greater and savings at high levels were greater.

The savings figures at every income level are in themselves averages made up of some families and single persons with net savings and others with net deficits. Thus, even at the under-\$500 income level, some consumers managed substantial savings, whereas others with incomes as high as \$10,000 ended the year or the quarter in the red. At the lower levels, however, the proportion of consumers incurring deficits and the amounts of their deficits were so great as to more than outweigh the smaller proportion with net savings.

TABLE 9.—Average Money Income and Outlay,¹ City Families and Single Persons, by Money Income Class

12 MONTHS OF 1941

Annual money income class	Average money income	Average money expenditures for—			Average net saving ³ (+) or deficit (—)
		Current consumption	Gifts and contributions	Personal-tax payments ²	
<i>Money income, 1941</i>					
Under \$500.....	\$307	\$420	\$20	(⁴)	—\$126
\$500 and under \$1,000.....	743	750	30	\$1	—35
\$1,000 and under \$1,500.....	1,246	1,215	45	3	+1
\$1,500 and under \$2,000.....	1,750	1,671	68	8	+32
\$2,000 and under \$2,500.....	2,240	2,103	91	11	+74
\$2,500 and under \$3,000.....	2,742	2,516	115	14	+137
\$3,000 and under \$5,000.....	3,732	3,246	164	23	+327
\$5,000 and under \$10,000.....	6,208	4,704	309	97	+1,091
Percent of money income ⁵					
Under \$500.....	100.0	136.5	6.6	0.1	—41.0
\$500 and under \$1,000.....	100.0	100.9	4.1	.1	—4.7
\$1,000 and under \$1,500.....	100.0	97.5	3.6	.2	+1.1
\$1,500 and under \$2,000.....	100.0	95.5	3.9	.5	+1.8
\$2,000 and under \$2,500.....	100.0	93.9	4.0	.5	+3.3
\$2,500 and under \$3,000.....	100.0	91.8	4.2	.5	+5.0
\$3,000 and under \$5,000.....	100.0	87.0	4.4	.6	+8.8
\$5,000 and under \$10,000.....	100.0	75.8	5.0	1.6	+17.6

FIRST 3 MONTHS OF 1942

<i>Money income, 1942⁶</i>					
Under \$500.....	\$75	\$105	\$2	\$1	—\$37
\$500 and under \$1,000.....	182	207	6	1	—30
\$1,000 and under \$1,500.....	312	310	10	2	—4
\$1,500 and under \$2,000.....	436	400	16	5	+24
\$2,000 and under \$2,500.....	556	489	21	8	+48
\$2,500 and under \$3,000.....	685	585	26	13	+71
\$3,000 and under \$5,000.....	932	764	34	26	+113
\$5,000 and under \$10,000.....	1,615	1,184	58	82	+298
Percent of money income ⁶					
Under \$500.....	100.0	143.6	2.5	1.2	—49.2
\$500 and under \$1,000.....	100.0	114.1	3.4	.3	—16.6
\$1,000 and under \$1,500.....	100.0	99.1	3.2	.8	—1.2
\$1,500 and under \$2,000.....	100.0	91.8	3.6	1.1	+5.6
\$2,000 and under \$2,500.....	100.0	87.9	3.8	1.4	+8.7
\$2,500 and under \$3,000.....	100.0	85.4	3.8	1.8	+10.4
\$3,000 and under \$5,000.....	100.0	82.1	3.6	2.8	+12.1
\$5,000 and under \$10,000.....	100.0	73.3	3.6	5.1	+18.4

¹ The difference between income and expenditures plus savings is accounted for by minor discrepancies in figures furnished by families and in a few instances by nonincome funds, such as inheritances received.

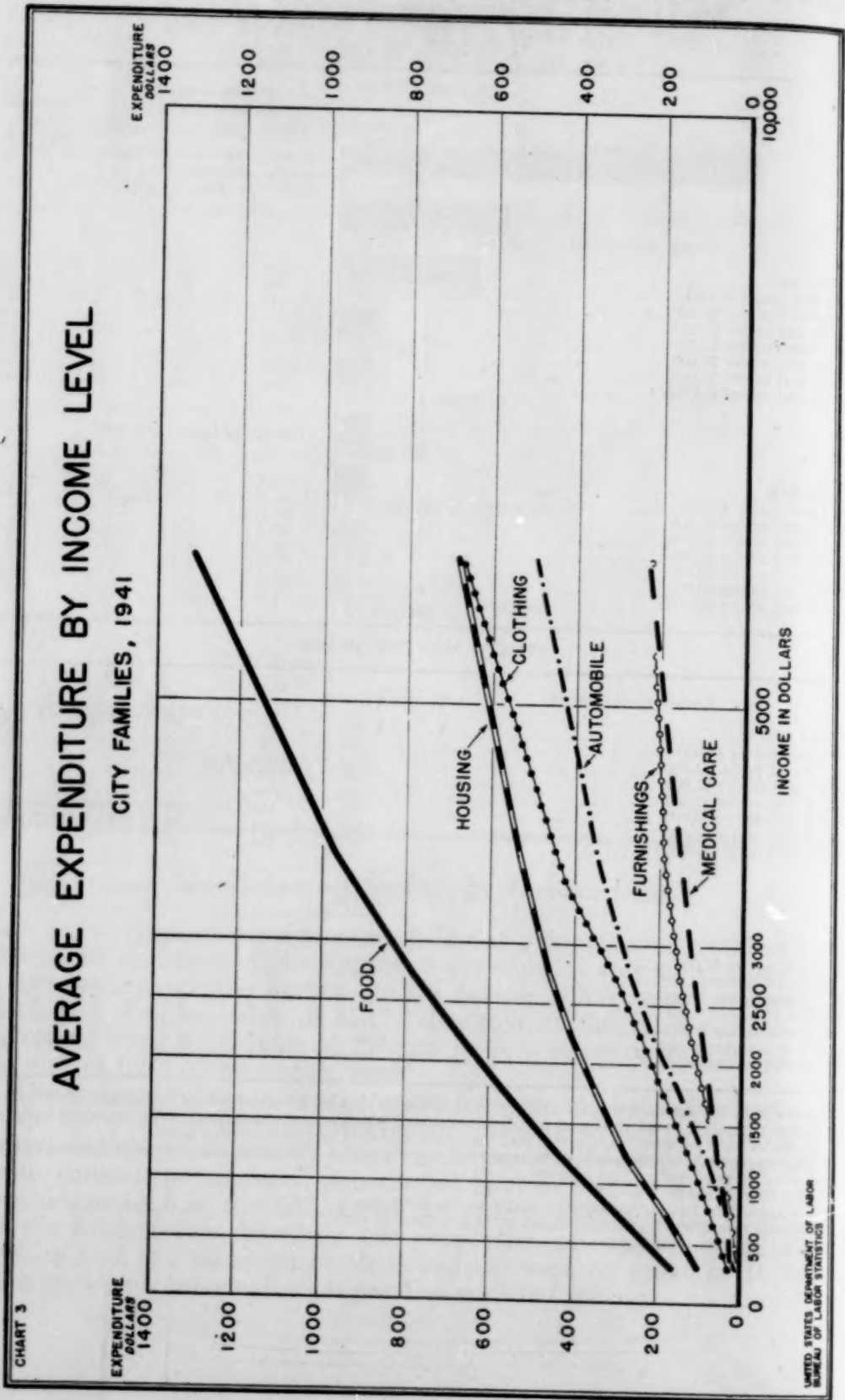
² Includes only personal income tax, poll taxes, and certain personal-property taxes.

³ Figures for 1942 include amounts in excess of the one-fourth of Federal income tax on 1941 income which were actually paid during first quarter of 1942.

⁴ Less than 50 cents.

⁵ Computed on basis of unrounded dollar-and-cent figures.

⁶ Annual rate of money income based on first quarter of 1942.



For low-income consumers, on the average, the first quarter of 1942 brought a large increase in debt. While savings for the entire group of city consumers were increasing by 70 percent, and the savings in income levels from \$1,500 to \$10,000 by 75 percent, consumers at the lowest levels were incurring debts or withdrawing from past savings to the extent of \$21 during the quarter. This compares with a quarterly average decrease in assets or increase in liabilities during 1941 of \$10.

The inability of the low-income groups to make ends meet during the first 3 months of 1942 is partly explained by increased living costs. Thus, families and single persons with incomes below \$1,500 in 1942 and almost the same income in 1941 spent 7 percent more in the later than in the earlier period. This increase in expenditures almost exactly matched the 7.5-percent increase in living costs that occurred between the two periods. Those with fixed incomes, however, met such increases in living costs by incurring debts or drawing on past savings.

In addition to the substantial number with fixed incomes there was a large number of consumers to whom 1942 meant sharply decreased incomes. Thus, fully one-sixth of all those with incomes below \$1,500 in 1942 had incomes in 1941 which were more than 33 percent higher. These consumers, in many cases the victims of priority unemployment, were unable to lower their level of living to the full extent of their decline in income. They incurred debts or made withdrawals from past savings.

The increase in expenditures at these lowest levels was not scattered among all items of expenditure, however. Food, housing, and medical care each came in for higher expenditures during 1942. Thus, while at the income level \$500 to \$1,000 total expenditures increased by \$78 per year, expenditures for food, housing, and medical care increased by \$76. About 44 percent of the money income of all city consumers with incomes between \$500 and \$1,000 went for food, and another 28 percent for housing, fuel, and light, in the early months of 1942, as compared with 40 and 24 percent, respectively, for those with similar incomes in 1941. With clothing and other essentials to be bought, the debts of families in this group amounted to 17 percent of the total of their current cash incomes.

In contrast with the consumers at the lower income levels, families with incomes above \$1,500 in 1942 spent less for current consumption and saved more than families with incomes of that amount had done in 1941. The combined effect of the wartime cessation of the production of durable goods and the increased volume of war-bond purchases was apparent in the sharply increased savings at each income level of consumers whose incomes were the same in 1941 and 1942.

One-fourth of the families and single persons with 1942 incomes above \$1,500, however, were those who had received income increases of 25 percent or more. Their level of living did not increase to nearly the same extent as their income. Their income increases were in large part devoted to paying off old debts and buying war bonds.

The decreases in expenditure at income levels above \$1,500 were concentrated in two groups—automobiles and furnishings. Since expenditures for other items in the aggregate showed only a small decline, it may be concluded that the sharp increases in savings at these levels were made possible chiefly by the reduction in the expenditures for these two groups.

TABLE 10.—Average Money Expenditures of City Families and
12 MONTHS

Annual money income class	Total	Food	Housing, fuel, light, refrigeration	House- hold opera- tion	Furnish- ings and equip- ment	Cloth- ing	Auto- mobile
<i>Money income, 1941</i>							
Under \$500.....	\$420	\$167	\$103	\$20	\$8	\$29	\$16
\$500 and under \$1,000.....	750	295	177	33	22	71	33
\$1,000 and under \$1,500.....	1,215	433	271	50	50	128	81
\$1,500 and under \$2,000.....	1,671	558	344	71	89	184	148
\$2,000 and under \$2,500.....	2,103	674	405	92	123	242	210
\$2,500 and under \$3,000.....	2,516	784	456	112	153	303	265
\$3,000 and under \$5,000.....	3,246	973	534	152	193	421	353
\$5,000 and under \$10,000.....	4,704	1,311	682	275	228	673	496
Percent of money income ¹							
Under \$500.....	136.5	54.3	33.3	6.5	2.7	9.5	5.1
\$500 and under \$1,000.....	100.9	39.7	23.9	4.5	3.0	9.5	4.4
\$1,000 and under \$1,500.....	97.5	34.8	21.7	4.0	4.0	10.2	6.5
\$1,500 and under \$2,000.....	95.5	31.9	19.7	4.1	5.1	10.5	8.4
\$2,000 and under \$2,500.....	93.9	30.1	18.1	4.1	5.5	10.8	9.4
\$2,500 and under \$3,000.....	91.8	28.6	16.6	4.1	5.6	11.0	9.7
\$3,000 and under \$5,000.....	87.0	26.1	14.3	4.1	5.2	11.3	9.4
\$5,000 and under \$10,000.....	75.8	21.1	11.0	4.4	3.7	10.9	8.0

FIRST 3 MONTHS

<i>Money income, 1942 ²</i>							
Under \$500.....	\$105	\$45	\$27	\$5	\$2	\$7	\$3
\$500 and under \$1,000.....	207	81	51	9	5	16	8
\$1,000 and under \$1,500.....	310	111	73	13	11	30	14
\$1,500 and under \$2,000.....	400	141	90	18	14	44	21
\$2,000 and under \$2,500.....	489	168	103	22	19	58	29
\$2,500 and under \$3,000.....	585	194	115	27	26	73	40
\$3,000 and under \$5,000.....	764	241	132	35	41	101	63
\$5,000 and under \$10,000.....	1,184	332	169	64	82	166	119
Percent of money income ¹							
Under \$500.....	143.6	59.8	36.2	6.7	2.9	9.5	4.4
\$500 and under \$1,000.....	114.1	44.4	28.3	5.1	2.9	8.6	4.3
\$1,000 and under \$1,500.....	99.1	35.7	23.2	4.2	3.6	9.6	4.3
\$1,500 and under \$2,000.....	91.8	32.3	20.5	4.1	3.3	10.0	4.7
\$2,000 and under \$2,500.....	87.9	30.1	18.5	4.0	3.4	10.3	5.3
\$2,500 and under \$3,000.....	85.4	28.4	16.8	3.9	3.7	10.6	5.9
\$3,000 and under \$5,000.....	82.1	25.9	14.2	3.8	4.4	10.9	6.8
\$5,000 and under \$10,000.....	73.3	20.6	10.4	4.0	5.0	10.3	7.4

¹ Computed on the basis of unrounded dollar-and-cent figures.² Annual rate of income based on first quarter of 1942.³ Less than 50 cents.

Direct-tax payments at the lowest income levels represent mostly poll taxes and occasional small amounts of personal-property taxes. In some instances, however, consumers whose incomes in the 1942 period were greatly reduced from the previous year were paying income tax on the previous year's income. At the higher incomes where income-tax returns are the most important part of the total personal-tax figure, the tax rose both in dollars and as a percentage of income. The rise was much steeper in 1942 than in 1941, largely as a result of higher tax rates and lowered exemptions.

Single Persons for Current Consumption, by Money Income Class

OF 1941

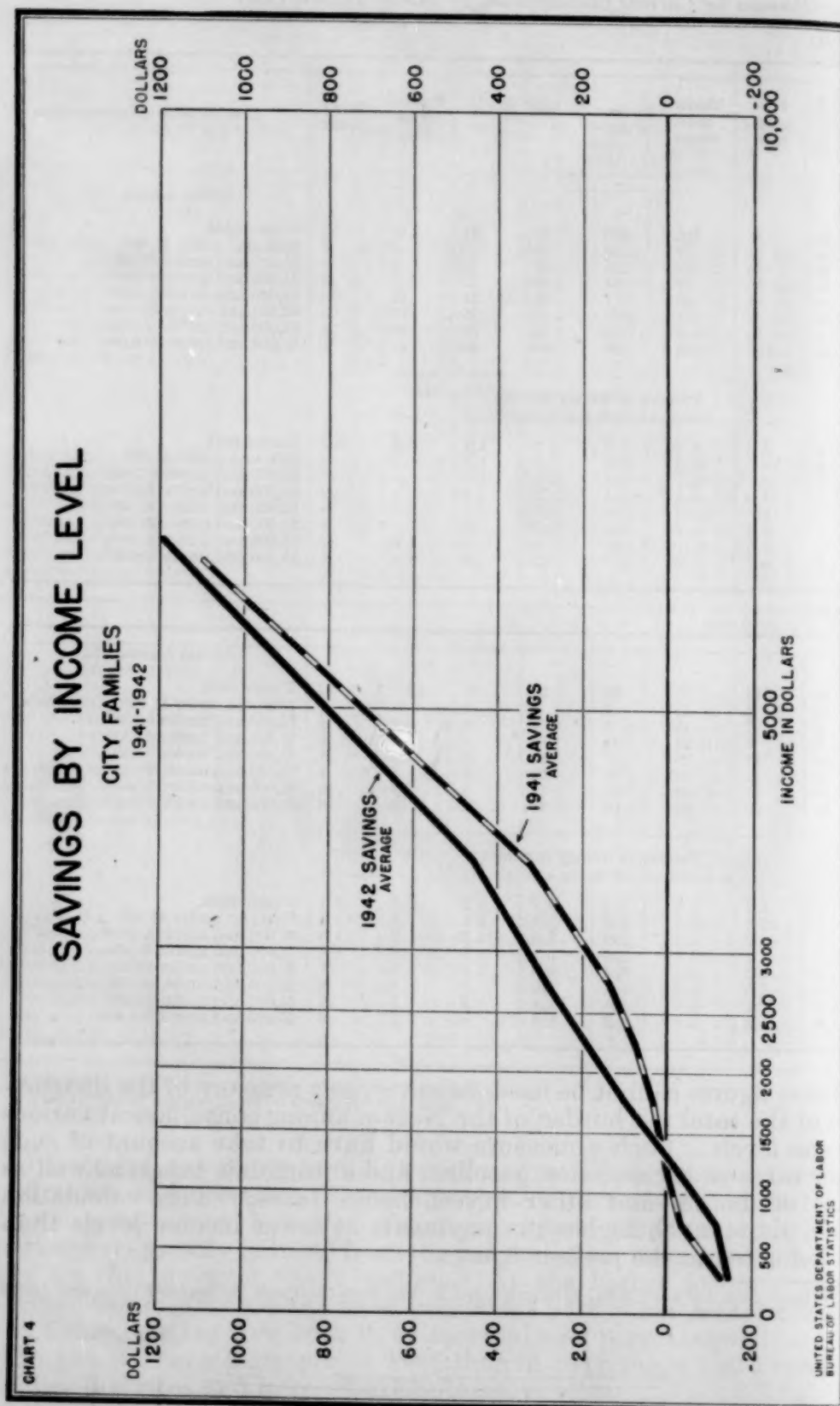
Other transportation	Personal care	Medical care	Recreation	Tobacco	Reading	Formal education	Other items	Annual money income class
								<i>Money income, 1941</i>
\$8	\$8	\$26	\$20	\$7	\$4	\$3	\$1	Under \$500.
16	17	32	20	19	8	4	3	\$500 and under \$1,000.
26	26	58	35	31	13	4	9	\$1,000 and under \$1,500.
34	36	77	54	38	17	7	14	\$1,500 and under \$2,000.
42	45	96	77	46	21	12	18	\$2,000 and under \$2,500.
50	55	115	103	55	25	18	22	\$2,500 and under \$3,000.
70	72	153	158	72	33	36	26	\$3,000 and under \$5,000.
132	108	236	293	105	49	85	31	\$5,000 and under \$10,000.
Percent of money income ¹								
2.5	2.7	8.3	6.6	2.3	1.4	0.8	0.5	Under \$500.
2.2	2.2	4.3	2.6	2.6	1.1	.5	.4	\$500 and under \$1,000.
2.1	2.1	4.7	2.8	2.5	1.0	.4	.7	\$1,000 and under \$1,500.
1.9	2.0	4.4	3.1	2.2	1.0	.4	.8	\$1,500 and under \$2,000.
1.8	2.0	4.3	3.4	2.1	1.0	.5	.8	\$2,000 and under \$2,500.
1.8	2.0	4.2	3.8	2.0	.9	.7	.8	\$2,500 and under \$3,000.
1.9	1.9	4.1	4.2	1.9	.9	1.0	.7	\$3,000 and under \$5,000.
2.1	1.7	3.8	4.7	1.7	.8	1.4	.5	\$5,000 and under \$10,000.

OF 1942

								<i>Money income, 1942</i>
\$1	\$2	\$7	\$1	\$2	\$1	(²)	\$2	Under \$500.
5	4	13	4	4	2	\$1	4	\$500 and under \$1,000.
8	7	18	8	7	4	2	4	\$1,000 and under \$1,500.
9	9	23	12	9	4	2	4	\$1,500 and under \$2,000.
10	11	28	17	11	5	4	4	\$2,000 and under \$2,500.
12	13	34	23	13	6	5	4	\$2,500 and under \$3,000.
16	17	43	36	17	8	9	5	\$3,000 and under \$5,000.
30	26	61	69	24	12	20	10	\$5,000 and under \$10,000.
Percent of money income ¹								
1.9	3.2	9.4	1.6	2.7	1.9	.3	3.1	Under \$500.
2.6	2.3	7.3	2.2	2.4	1.1	.6	2.0	\$500 and under \$1,000.
2.5	2.2	5.8	2.6	2.3	1.2	.5	1.4	\$1,000 and under \$1,500.
2.0	2.1	5.3	2.8	2.1	1.0	.6	1.0	\$1,500 and under \$2,000.
1.8	2.0	5.1	3.1	2.0	1.0	.6	.7	\$2,000 and under \$2,500.
1.8	1.9	4.9	3.4	1.9	.9	.7	.6	\$2,500 and under \$3,000.
1.8	1.8	4.6	3.8	1.8	.8	.9	.6	\$3,000 and under \$5,000.
1.8	1.6	3.8	4.3	1.5	.8	1.2	.6	\$5,000 and under \$10,000.

These figures cannot be used, however, as a measure of the distribution of the total tax burden of the Nation among consumers at various income levels. Such a measure would have to take account of such other taxes as excise, sales, gasoline, and automobile taxes, as well as taxes on homes and other miscellaneous taxes.⁸ This calculation would show much higher tax payments at lower income levels than are indicated in the present figures.

¹ The latest such study is TNEC Monograph No. 3: Who Pays the Taxes, by Gerhard Colm and Helen Tarasov. Washington, 1940.



MARITIME LABOR FORCE IN THE UNITED STATES¹

Summary

THE ultimate success of the war shipping program depends not only on the ability to produce the requisite number of vessels, but also on the ability to man the ships after they are built. In order to determine the possible sources of additional workers to fill the growing demand, the Bureau of Labor Statistics conducted a sample survey of the records of the Bureau of Marine Inspection and Navigation which maintains a complete file of persons legally qualified for employment on United States merchant vessels of 100 tons or more.² The results of the survey are presented in this report.

In general, the survey revealed the existence in the summer of 1941 of a large number of men whose qualifications and work experience would enable them to fill at least a part of the wartime demand for maritime personnel. Thus, the records of over two-thirds of the persons who held licenses or certificates qualifying them for maritime employment at the time of the study (July 15 to September 15, 1941) indicate that they had not been employed aboard ship for a year or more. Of those persons who had been employed aboard ship during the period of the study, a large proportion had been so employed only part of the time, and many others were working below the occupational level at which their training and work experience lawfully enabled them to engage. An unknown, but probably major, proportion of those not employed aboard ship at all or only part time during the period of the study were engaged in land pursuits. This condition must be recognized in any recruiting campaign that is undertaken; it would be a mistake to assume that all of these people will in fact be available or can be spared from their present jobs. Nevertheless, the existence less than 1 year ago of a large body of qualified maritime personnel, who were then inactive or unemployed as regards maritime employment, affords an opportunity to meet a large part of the need for manning the merchant marine with qualified personnel.

Perhaps the outstanding single fact disclosed by the survey is the fact that a large proportion of the men who held licenses or certificates enabling them to engage in maritime employment were not so engaged at the time the study was made. On the basis of the 5-percent sample from the records of the Bureau of Marine Inspection and Navigation, it is estimated that there were in the summer of 1941 approximately 366,000 persons who had obtained BMIN papers for seafaring employment since early in 1937. Of these, about 115,000 were employed in the merchant marine at some time between August 1940 and August 1941. The remainder (251,000) had no seafaring work at all during that interval.³ In other words, fully seven-tenths of the men who held licenses or certificates qualifying them to make voyages either on the Great Lakes or in salt water failed to make a trip between August 1940 and August 1941, though large numbers of them were undoubtedly engaged in full-time employments on land. As can be seen from the accompanying statement, a large proportion of ordinary seamen and

¹ Prepared in the Bureau's Occupational Outlook Division.

² More detailed data regarding this study will be published later.

³ An undetermined (but small) proportion of these inactive men may have died, become incapacitated, or retired because of age during this period.

deckhands, who were qualified to go to sea, did not do so. These men formed the largest single group among the ship's crew, the survey showing that they accounted for a little over two-fifths of total maritime personnel. However, this situation was by no means confined to the less skilled groups, for less than 3 out of every 5 of the highest ranking men (licensed officers) followed the sea in 1940-41. The percent of male licensed and certificated personnel, classified by occupational group, who were employed at sea or on the Great Lakes, during the year ending August 1941, is shown below:

	Percent
Total personnel.....	31
Nonqualified deck and engine (unskilled) personnel.....	13
Medical personnel.....	24
Purser personnel.....	26
Steward personnel.....	30
Qualified deck and engine (skilled) personnel ¹	48
Radio personnel.....	57
Licensed officer.....	59
Quasi-officer ²	77

¹ Includes petty officers on deck or in engine room and technical specialists.

² Includes able seamen and qualified members of the engine department.

There may be an opportunity to increase the amount of time spent at sea by those who are available. Especially it may be possible to shift temporarily to salt-water duty a large number of those who cannot be employed during the winter on the Great Lakes.

That fuller use can be made of the active part of the maritime labor force is clearly indicated by table 1, which shows that men who made their voyages on the Great Lakes between August 1, 1940, and March 31, 1941, for example, were employed on the average only a little more than two-thirds of the total possible time they could have spent on trips during that period. The situation was even worse among men sailing in salt water, for they were employed only one-half of the total possible time they could have spent on trips during that period.⁴ Underemployment was particularly severe among men in the younger age brackets who, in turn, were found to predominate in the lower ranks of the occupational scale.

TABLE 1.—*Personnel Making Voyages Between August 1, 1940, and March 31, 1941, by Age, and Percent Average Days Employed Were of Potential Employment Time*

Age	Average days employed as percent of potential employment time ¹	
	On voyages in salt water	On voyages on Great Lakes
All men.....	50	69
Under 21 years.....	28	54
21-34 years.....	49	69
35-54 years.....	54	73
55 years and over.....	51	73

¹ Potential employment time between August 1, 1940, and March 31, 1941, was taken as 243 days for salt-water voyages and 122 days for voyages on the Great Lakes.

⁴ It should be pointed out that only employment in the United States merchant marine for which discharge slips are issued were studied in the sample. Some of the workers may have been employed on ships of foreign registry or on transport duty with the armed forces, while others may not have been available for employment because of sickness. Furthermore, the continuous nature of employment while aboard ship renders it customary for maritime workers to take varying amounts of shore leave after each voyage. Nevertheless, the amount of underemployment prevailing during the time of the study was significantly high.

A third method of meeting the manpower needs of the merchant marine lies through the possibility for upgrading. It is rare in the war industries today to encounter a situation in which so large a proportion of the personnel is employed at less than its highest qualification. In the study of maritime personnel large numbers of cases were found where persons holding licenses qualifying them for more important work occupied lower ranks in the ship's crew. To cite but one example, more than half of the men qualified for employment as chief engineers were engaged at lower ratings on voyages made in salt water on February 15, 1941. Some men who qualified as masters were even found to be employed as able seamen. The situation existing among high-ranking officers on voyages in salt water on February 15, 1941, was as follows:

Percent employed, holding highest occupational rank

Highest occupational rank held:

Deck department:

Master.....	7
First mate.....	13
Second mate.....	23

Engine department:

Chief engineer.....	42
First assistant engineer.....	33
Second assistant engineer.....	32

The Unskilled Workers

It has already been pointed out that, because of the fact that 7 out of every 10 maritime workers were not employed at sea for a period of 1 year, presumably large numbers of them can be recruited during the emergency period, even though they have other employments. In considering such a program, however, it is important to note that the inactive maritime labor force differs markedly from its active counterpart in at least one vital respect, i. e., its occupational composition.

The occupational distribution of the active maritime labor force, as shown in the accompanying statement, approximates the situation as it actually exists on a typical American vessel. About a fifth of the men were licensed officers, while almost three-fifths were working as qualified (skilled) men or higher. The same was not true for the inactive workers who, as a group, were much less skilled. Only about a fifth of them were licensed officers, while more than half were concentrated among the nonqualified (unskilled) personnel.

	Percentage distribution	
	Active	Inactive
Total personnel.....	100.0	100.0
Licensed officers.....	18.6	5.8
Quasi-officers ¹	10.3	1.4
Qualified deck and engine personnel ²	29.5	14.3
Nonqualified deck and engine personnel.....	17.7	52.7
Radio personnel.....	2.1	.7
Medical personnel.....	.2	.2
Steward personnel.....	20.6	20.4
Purser personnel.....	.9	1.1
Other personnel.....	.1	3.4

¹ Includes petty officers on deck or in engine room and technical specialists.

² Includes able seamen and qualified members of the engine department.

A recruitment program aiming to bring into more active participation in the maritime labor force the man who is qualified for work at sea, but has left the sea temporarily or permanently, will therefore yield a disproportionate share of comparatively untrained workers. This fact makes all the more important the coordination of training and upgrading with recruitment.

Negro Workers

Negroes not only form a very small fraction of total maritime personnel (6 percent), but are also concentrated among the unskilled occupations. The occupational distribution of white and Negro workers shows that fully three-fourths of all male Negro active maritime personnel were attached to the steward's office in a nonadministrative capacity, i. e., as janitors, watchmen, waiters, pantrymen, cooks, etc. There was only one Negro among licensed officers and none at all among radio, medical, and purser personnel.

The small number of Negroes in the maritime labor force points to an obvious channel for the recruitment of additional workers. The occupational distribution shown below, however, indicates that recruitment would be pointless if it merely resulted in additional unskilled workers for the steward's department. Recruitment among Negroes should aim to bring in more skilled personnel, or should be coordinated with a program of upgrading the currently active Negro workers.

	Whites	Negroes
Total personnel.....	100. 0	100. 0
Licensed officers.....	20. 5	. 3
Quasi-officers ¹	11. 1	1. 7
Qualified deck and engine personnel ²	30. 8	10. 9
Nonqualified deck and engine personnel.....	18. 4	9. 7
Radio personnel.....	2. 3	-----
Medical personnel.....	. 2	-----
Steward personnel.....	15. 7	77. 4
Purser personnel.....	. 9	-----
Other personnel.....	. 1	-----

¹ Includes petty officers on deck or in engine room and technical specialists.

² Includes able seamen and qualified members of the engine department.

Woman Workers

Women have always comprised a negligible proportion of the Nation's maritime labor force. The present study indicates that less than 2 percent of the active maritime personnel were women. Moreover, they were concentrated in a few selected occupations such as stewardess, nurse, or waitress and found most of their employment aboard luxury passenger vessels. It is doubtful whether women can be used on an extensive scale to alleviate shortages of workers for freighters and tankers.

Alien Workers

Legal limitations prevailing at the time of the present study restricted the employment of noncitizens on American vessels. All licensed deck and engine officers and radio operators, for example, had

to be citizens of the United States, and aliens were permitted to work only in unlicensed capacities and then only in limited proportions depending on the type of vessel and its subsidy status.⁵ Because of these restrictions the maximum proportion of aliens permitted among ship personnel was 23 percent. Actually, 20 percent of the persons on American ships at that time were aliens, indicating that use of them was being made almost up to the legal limit.

Citizenship requirements will also limit the utilization of inactive maritime personnel. More than one-fourth of all the male inactive maritime personnel at the time of the study were not of established American citizenship. The lack of citizenship was particularly prevalent among the inactive quasi-officers and qualified personnel, almost two-fifths of the latter falling in this category.

	Percent not of established American citizenship ¹
Total personnel.....	27
Licensed officers.....	12
Quasi-officers.....	35
Qualified deck and engine personnel ²	39
Nonqualified deck and engine personnel ³	22
Radio personnel.....	32
Medical personnel.....	23
Steward personnel.....	34
Purser personnel.....	32
Other personnel.....	34

¹ Includes in addition to aliens, persons whose claim to citizenship was being reviewed at the time of the study.

² Includes petty officers on deck or in engine room and technical specialists.

³ Includes able seamen and qualified members of the engine department.

Younger and Older Workers

Marked age differences prevail in the various occupations of the maritime labor force. As table 2 shows, seven-tenths of the men 55 years of age and over were working as qualified (skilled) personnel or higher. It is interesting to note that practically all of these older men who were not in the higher ranks were working in unskilled capacities in the steward's department. In other words, very few of the older men were found in the intermediate brackets of the occupational scale. They were either up in the officer ranks or down in the unskilled group in the steward's department.⁶

⁵ Aboard nonsubsidized vessels, for example, no more than 25 percent of the unlicensed personnel could be aliens, aboard subsidized passenger-freight vessels, no more than 10 percent, and aboard subsidized dry-cargo vessels, none at all.

⁶ Although data on this point were not obtained, the distinct bimodal occupational distribution among the older workers was probably due, in part, to race, the older whites being concentrated among the licensed officers and the older Negroes among the steward personnel.

TABLE 2.—Active Male Maritime Personnel, Classified by Occupation and Age

Occupation	Percentage distribution				
	Total	Under 21 years	21-34 years	35-54 years	55 years and over
Total personnel.....	100.0	100.0	100.0	100.0	100.0
Licensed officers.....	18.6	1.0	12.9	24.8	32.6
Quasi-officers.....	10.3	1.0	8.8	13.3	11.2
Qualified deck and engine personnel ¹	29.5	12.8	23.2	29.2	26.8
Non-qualified deck and engine personnel ²	17.7	69.3	22.6	6.6	3.6
Radio personnel.....	2.1	1.3	2.4	2.2	.2
Medical personnel.....	.2		.1	.1	.0
Steward personnel.....	20.6	12.8	18.8	23.0	24.7
Purser personnel.....	.9	1.8	1.1	.7	
Other personnel.....	.1		.1	.1	

¹ Includes petty officers on deck or in engine room and technical specialists.

² Includes able seamen and qualified members of the engine department.

It is among persons in the youngest age group (who were concentrated in the ranks below qualified officers) that the best source for the recruitment and fuller utilization of maritime personnel can be found. Although the legal minimum-age requirements were not important as a restriction on employment,⁷ the men under 21 years of age experienced the greatest amount of underemployment (table 1) and also showed the largest proportion of inactivity as is indicated by the following:

	Percent inactive
All men.....	69
Under 21 years.....	81
21-34 years.....	74
35-54 years.....	59
55 years and older.....	61

The younger persons also would seem to be the most fertile source for the program of upgrading maritime personnel. For example, more than two-thirds of the men who were under 21 years of age (and almost one-fourth of those between 21 and 34 years) were in the category of nonqualified (unskilled) personnel. The program of upgrading might well aim to raise these men to the next highest category, i. e., the skilled (qualified) worker.

⁷ Most officers' licenses require the person to be over 21 years, although some licensed occupations have a requirement of 19 years. Qualified members of the engine department and able seamen must also be 19 years of age.

EMPLOYMENT OF WOMEN IN WARTIME

CONSIDERING the entire labor force of the United States, the employment of women has been increasing at a faster rate than that of men. The WPA Monthly Report of Employment and Unemployment indicates that during the year ending with May 1942 the number of women employed rose by 1,700,000, whereas for men the corresponding figure was 1,400,000. When the manufacturing industries only are considered, the reverse is true. Thus, data collected by the Bureau of Labor Statistics show that in the year ending in April 1942, although nearly 200,000 additional women had been employed, this represented an increase of only 8 percent as compared with 12 percent for men. The situation in individual manufacturing industries varied considerably. In the metal-working industries there was practically no change over the 3-year period from 1939 to 1942. In these industries women constituted a much smaller proportion of the total working force than was shown by manufacturing generally; in May 1942 they formed about 13 percent of the total number employed.

*Women in Manufacturing Industries, April 1942*¹

Of the 10,744,000 wage earners employed in private manufacturing establishments in the United States in April 1942, approximately 2,400,000, or 22 percent, were women. This proportion was slightly lower than it was a year earlier, despite an increase of nearly 200,000 woman wage earners² between April 1941 and April 1942. The slight decline in the proportion of woman workers reflects the fact that the number of male factory wage earners increased by almost 12 percent over the year period as compared with a corresponding increase of only 8 percent among the women (see table 1).

TABLE 1.—*Estimated Employment of Factory Wage Earners, by Sex, April 1941 and April 1942*

[In thousands]

Item	April 1941				April 1942				Percent of increase, April 1941 to April 1942		
	Total	Men	Women	Percent of women	Total	Men	Women	Percent of women	Total	Men	Women
Total manufacturing...	9,677.6	7,476.4	2,201.2	22.7	10,744.5	8,364.5	2,380.0	22.2	11.0	11.9	8.1
Durable goods.....	4,917.2	4,513.5	403.7	8.2	5,771.8	5,300.8	471.0	8.2	17.4	17.4	16.7
Nondurable goods..	4,760.4	2,962.9	1,797.5	37.8	4,972.7	3,063.7	1,909.0	38.4	4.5	3.4	6.2

The above estimates by the Bureau of Labor Statistics are based on reports from approximately 22,000 identical establishments employing 4,800,000 wage earners in April 1942.³

¹ Prepared in the Employment and Occupational Outlook Branch, Bureau of Labor Statistics.

² Including approximately 20,000 woman workers in war industries not covered by the Bureau's present manufacturing industry classifications.

³ The estimates are subject to change since the entire series of employment indexes is now in the process of complete adjustment and revision. More detailed information will be made available at a later date.

Although the greater part of the expansion in manufacturing employment between April 1941 and April 1942 took place in the durable-goods industries, almost two-thirds of the increase among woman workers occurred in plants manufacturing nondurable goods. This was to be expected since the great majority of woman factory wage earners are employed in nondurable-goods industries. However, it is also indicative of the shift of men from the nondurable industries to many of the higher-paid war industries which account for the greater part of the durable-goods employees. The jobs of these men are being filled by women, who can be trained readily to perform many of the operations. Some operations are being simplified to facilitate this replacement. The employment of women has undoubtedly continued to increase since April 1942, for many new war plants have started operations in rural areas where women form the largest available source of labor supply.

The increase in employment among women was general throughout most of the nondurable-goods industries, with a pronounced increase in the chemicals group (table 2). Among the durable-goods industries large relative increases occurred in the machinery, transportation (except automobile), and lumber industries.

TABLE 2.—*Employment of Woman Wage Earners in Selected Manufacturing Groups*

Industry group	Number of women per 1,000 employed wage earners—		Percent of change in total number of women employed, April 1941 to April 1942
	April 1941	April 1942	
Iron and steel.....	68	68	+6.7
Machinery (except electrical).....	42	46	+37.0
Electrical machinery.....	266	276	+28.4
Transportation equipment.....	10	25	+555.5
Automobiles.....	77	87	+28.1
Lumber.....	16	21	+32.8
Textiles.....	548	562	+3.5
Leather.....	403	414	+5.3
Food.....	223	224	+7.9
Chemicals and petroleum.....	102	137	+56.6

WOMEN IN METALWORKING AND MACHINERY INDUSTRIES, MAY 1942

Additional information concerning the employment of women in industry is available from a survey of employment in metalworking and machinery plants. This survey, which covered 6,171 plants in 108 industries⁴ employing approximately 2,900,000 wage earners, was conducted in May 1942 by the Bureau of Labor Statistics at the request of the War Production Board.

Although 75 of the 108 industries surveyed showed increases in the proportion of women employed (table 3), the proportion (13 percent) for the group as a whole was virtually the same in May 1942 as it was in October 1939.⁵ There were downward shifts in only 28 of the industries, but among these were automobile, radio, and other industries employing very large numbers of wage earners. Both the up-

⁴ Wage earners in the shipbuilding industry were not included in the survey. In May 1942, women accounted for 0.4 percent of the wage earners in this industry.

⁵ Interpretation of these comparisons must be made in the light of the fact that the 1939 figures were based on a complete census of the various industries whereas the 1942 figures were based on a sample which, although extensive, did not represent complete coverage.

ward and downward shifts in the proportion of women were generally very small.

As a group, the metalworking and machinery plants employed a much lower proportion of women than did manufacturing plants in general. In October 1939, 13 percent of the workers in the selected metalworking and machinery industries were women, whereas in all manufacturing industries combined, women formed 25 percent of the total. The great majority of woman wage earners were in food, tobacco, textile, and clothing factories. In 85 of the 108 metalworking and machinery industries, fewer than 25 percent of the wage earners were women.

The employment pattern for the 108 industries was dominated by plants which generally employ relatively few women. In the pre-war period these plants produced automobiles, locomotives, railroad and street cars, aircraft, tractors, castings, electrical generating and distribution apparatus, steam and internal-combustion engines, and similar heavy goods.

The machinery or metalworking industries that do employ relatively large numbers of women are those which in peacetime made small articles such as clocks and watches, collapsible tubes for toothpaste and similar substances, electric lamps, radios and phonographs, pens and mechanical pencils, needles and fasteners, communication equipment, and equipment for dental offices and barber and beauty shops. These industries, however, accounted for a comparatively small fraction of all wage earners in the selected industries.

The industrial classification used in table 3 refers to the normal output of the plants. By May 1942 the War Production Board had issued orders limiting or stopping production of goods customarily manufactured in many of these plants. Consequently, large proportions of the workers in May 1942 were employed by plants which were producing some type of ordnance (such as guns and ammunition and parts, sighting and fire-control apparatus, tanks and parts, and aircraft parts) as well as other war materials and supplies.

The conversion to war production had resulted in no definite trend toward relatively greater employment of women by May 1942. Examples of both increases and reductions in the proportion of women can be cited. Rapid expansion of the aircraft industry increased relative numbers of woman workers from 1 percent of the total in 1939 to nearly 7 percent by May 1942. Plants customarily making vending and coin-operated machines reported a substantially larger proportion of women in May 1942 than in 1939, and the increase was wholly in those plants which were doing ordnance work. Similarly, plants formerly manufacturing domestic laundry equipment reported relatively more women throughout the industry, but again the principal gains were in plants producing ordnance. On the other hand, in the miscellaneous electrical-products and communication-equipment industries, proportionately fewer women were employed in plants with ordnance work than in those without, with the result that the proportions of women throughout these industries were reduced.

Such decreases in the use of women may be only temporary, during the period when large numbers of skilled mechanics were adapting equipment designed for producing civilian supplies to war production. After conversion is complete, it is possible that a higher proportion of woman operatives will be making war materials than were formerly engaged in peacetime production.

TABLE 3.—Employment of Women in Selected Manufacturing Industries, May 1942

Industry	Number of plants reporting ¹	Number of wage earners		Percent of females	
		Total	Female	May 1942	October 1939 ²
Iron and steel and their products, except machinery:					
Automobile stampings.....	35	7,138	1,053	14.8	18.8
Bolts, nuts, washers, and rivets.....	69	16,518	2,624	15.9	13.7
Cast iron pipe and fittings.....	58	20,101	94	.5	.2
Cutlery.....	72	13,452	3,304	24.6	27.7
Doors, window sash, frames, molding and trim.....	44	7,176	155	2.2	.6
Enameled-iron sanitary ware and other plumbers' supplies.....	98	21,375	1,510	7.1	5.5
Fabricated structural and ornamental metalwork.....	202	31,954	43	.1	.1
Files.....	6	3,912	475	12.1	9.2
Firearms.....	15	(³)	(³)	7.4	4.8
Forgings, iron and steel.....	90	27,599	173	.6	.3
Gray-iron and semisteel castings.....	284	50,134	799	1.6	.6
Hardware not elsewhere classified.....	147	36,142	9,368	25.9	23.1
Heating and cooking apparatus (except electric) not elsewhere classified.....	28	3,196	199	6.2	3.7
Malleable-iron castings.....	63	26,812	885	3.3	3.8
Nails, spikes, etc.....	14	2,147	575	26.8	24.5
Oil burners, domestic and industrial.....	16	2,041	29	1.4	.8
Power boilers and associated products.....	110	27,489	7	(⁴)	(⁴)
Safes and vaults.....	4	2,993	21	.7	.4
Saws.....	15	6,298	442	7.0	4.6
Screw-machine products and wood screws.....	149	33,691	6,712	19.9	11.7
Springs, steel (except wire).....	22	3,405	158	4.6	.9
Stamped and pressed metal products.....	184	31,186	8,429	27.0	24.1
Steam and hot-water heating apparatus.....	28	5,959	41	.7	.1
Steam fittings.....	78	35,546	2,805	7.9	8.6
Steel barrels, kegs, and drums.....	33	6,737	668	9.9	11.0
Steel castings.....	132	69,826	83	.1	.1
Stoves, ranges, water heaters, and hot-air furnaces.....	161	31,541	2,490	7.9	3.2
Tin cans and tinware not elsewhere classified.....	147	33,926	10,452	30.8	28.4
Tools (except edge tools), machine tools, files, and saws.....	82	17,489	2,134	12.2	10.7
Vitreous-enameled products.....	42	12,119	3,285	27.1	24.2
Wire drawn from purchased rods.....	67	20,830	2,330	11.2	10.9
Wirework not elsewhere classified.....	130	20,688	4,794	23.2	22.1
Wrought pipes, welded and heavy riveted.....	26	15,998	248	1.6	4.7
Nonferrous metals and their products:					
Clocks, watches, and material and parts.....	24	19,415	9,919	51.1	47.7
Collapsible tubes.....	11	1,712	1,164	68.0	71.0
Jewelers' findings and materials.....	30	3,345	1,348	40.3	38.3
Jewelry (precious metals).....	29	4,584	2,344	51.1	23.6
Lighting fixtures.....	83	14,967	3,517	23.5	25.7
Nonferrous-metal foundries (except aluminum).....	135	(⁵)	(⁵)	2.1	.9
Nonferrous metal products, not elsewhere classified.....	124	(⁵)	(⁵)	14.5	13.0
Sheet-metal work, not specifically classified.....	72	9,811	725	7.4	1.5
Silverware and plated ware.....	29	10,027	2,338	23.3	21.5
Watchcases.....	10	2,347	777	33.1	28.9
Electrical machinery:					
Automotive electrical equipment.....	19	(⁶)	(⁶)	27.9	30.1
Batteries, storage and primary (dry and wet).....	46	(⁶)	(⁶)	21.8	17.9
Carbon products.....	8	(⁶)	(⁶)	29.1	13.8
Communication equipment.....	57	(⁶)	(⁶)	35.2	41.7
Electric lamps.....	20	(⁶)	(⁶)	74.6	77.3
Electrical appliances.....	55	(⁶)	(⁶)	29.3	27.9
Electrical measuring instruments.....	16	(⁶)	(⁶)	43.7	34.6
Electrical products not elsewhere classified.....	32	(⁶)	(⁶)	17.4	27.0
Generating, distribution, and industrial apparatus.....	192	(⁶)	(⁶)	16.5	18.6
Insulated wire and cable.....	37	(⁶)	(⁶)	25.4	30.7
Radios, radio tubes, and phonographs.....	102	72,840	33,393	45.8	54.2
Wiring devices and supplies.....	63	(⁶)	(⁶)	41.1	30.8
X-ray and therapeutic apparatus and electronic tubes.....	16	(⁶)	(⁶)	10.9	7.2
Machinery (except electrical):					
Agricultural machinery.....	107	39,959	1,250	3.1	1.3
Blowers, exhaust, and ventilating fans.....	15	3,648	103	2.8	.5
Cars and trucks, industrial.....	14	3,987	59	1.5	.6
Commercial laundry, dry-cleaning, and pressing machinery.....	17	4,177	53	1.3	1.7
Construction and similar machinery.....	107	36,206	153	.4	.2
Elevators, escalators, and conveyors.....	27	10,300	344	3.3	1.6
Food-products machinery.....	38	6,306	209	3.3	1.2
Industrial machinery not elsewhere classified.....	89	25,658	233	.9	1.0
Internal-combustion engines.....	46	(⁷)	(⁷)	3.6	2.8
Laundry equipment, domestic.....	16	3,976	611	15.4	4.3
Machine-shop products, not elsewhere classified.....	241	92,328	7,193	7.8	5.9
Machine-tool accessories.....	141	(⁷)	(⁷)	7.8	3.1
Measuring instruments, mechanical.....	29	5,016	486	9.7	9.6
Mechanical power-transmission equipment.....	68	53,034	8,857	16.7	12.5
Metalworking machinery and equipment not elsewhere classified.....	44	(⁷)	(⁷)	5.7	1.7

See footnotes at end of table.

TABLE 3.—Employment of Women in Selected Manufacturing Industries,
May 1942—Continued

Industry	Number of plants reporting ¹	Number of wage earners		Percent of females	
		Total	Female	May 1942	October 1939 ²
Machinery—Continued.					
Mining machinery and equipment.....	22	6,583	54	0.8	0.6
Office and store machines.....	47	37,830	9,026	23.9	23.9
Oil-field machinery and tools.....	56	12,804	371	2.9	.3
Paper-mill, pulp-mill, and paper-products machinery.....	34	6,748	4	.1	.1
Printing-trades machinery and equipment.....	24	11,107	586	5.3	3.8
Pumping equipment and pumps ³	88	31,626	1,007	3.2	6.4
Refrigerators.....	81	36,505	2,278	6.2	8.5
Scales and balances.....	21	3,131	246	7.9	6.4
Sewing machines, domestic and industrial.....	8	12,766	2,489	19.5	12.0
Special industry machinery not elsewhere classified.....	47	10,190	181	1.8	.9
Steam engines, turbines, and water wheels.....	11	(⁴)	(⁴)	3.2	.7
Stokers, mechanical, domestic and industrial.....	9	3,351	94	2.8	0
Textile machinery.....	52	22,534	1,351	6.0	4.0
Tractors.....	19	41,288	134	.3	.7
Vending, amusement, and other coin-operated machines.....	9	2,362	430	18.2	10.6
Woodworking machinery.....	20	3,766	31	.8	1.0
Transportation equipment:					
Aircraft and parts, including aircraft engines.....	54	(⁵)	(⁵)	6.9	1.1
Airframes.....	35	(⁵)	(⁵)	8.2	(⁵)
Engines.....	15	(⁵)	(⁵)	3.7	(⁵)
Propellers.....	4	(⁵)	(⁵)	3.7	(⁵)
Cars and car equipment.....	25	(⁵)	(⁵)	.9	.5
Locomotives.....	12	(⁵)	(⁵)	.4	.8
Motorcycles, bicycles, and parts.....	20	7,621	770	10.1	9.7
Motor vehicles, motor-vehicle bodies, parts and accessories.....	318	435,552	23,086	5.3	6.6
Miscellaneous industries:					
Beauty-shop and barber-shop equipment.....	15	1,872	637	34.0	44.0
Children's vehicles.....	12	2,148	598	27.8	17.4
Dental equipment and supplies.....	15	4,112	1,135	27.6	41.8
Fabricated plastic products.....	20	7,609	2,391	31.4	26.5
Fire extinguishers, chemical.....	5	3,638	348	9.6	9.9
Musical instruments, parts and materials, not elsewhere classified.....	20	2,165	324	15.0	14.1
Needles, pins, hooks and eyes, and fasteners.....	23	8,034	3,753	46.7	49.3
Ophthalmic goods, lenses and fittings.....	4	4,982	1,993	40.0	34.7
Optical instruments and lenses.....	11	3,360	831	24.7	18.4
Pens, mechanical pencils, and pen points.....	28	6,593	4,178	63.4	55.7
Photographic apparatus and materials.....	27	20,464	4,806	23.5	26.4
Pianos, organs, and parts.....	29	5,261	733	13.9	10.0
Professional and scientific instruments.....	44	33,418	6,006	18.0	14.5
Signs, advertising displays, and advertising novelties.....	31	4,474	1,243	27.8	21.9
Sporting and athletic goods not elsewhere classified.....	38	6,268	2,663	42.5	35.1
Surgical and medical instruments.....	12	2,073	612	29.5	20.2

¹ Plants with fewer than 25 wage earners in May are not included in the tabulation.² Source: 1939 Census of Manufactures—Persons Employed in Manufacturing Establishments, by Sex, August 1941.³ Not available for publication.⁴ Less than 0.05 percent.⁵ In 1939 Census of Manufacturing Industries, called "Measuring and dispensing pumps, and pumping equipment and air compressors."

EFFECT OF THE WAR ON TEXTILE EMPLOYMENT

By RUTH E. CLEM, Bureau of Labor Statistics ¹

Summary

WARTIME dislocations in the textile industries have thus far produced only a slight decline in total employment. Employment decreases are expected to become more marked as fabric inventories are depleted and curtailed production of fabrics for civilian use takes effect in the winter of 1942-43.

By the fourth quarter of 1942, total textile employment is expected to be about 5 percent below the 1941 peak. The greatest reduction is expected in women's wear plants, which to date have received little Government work. Only about half as great a reduction is expected in the men's wearing-apparel industries, since cotton-garment plants in particular are producing uniforms and essential work clothing for civilians. At the mill level, reductions will be most pronounced in the wool carpet, hat, and full-fashioned hosiery industries. Employment in the woolen and worsted, rayon and cotton goods industries will at least be maintained at current levels.

New wool has been drastically restricted for civilian use. In order to maintain civilian yardages, blending of wool with substitute fibers has been encouraged. The allocation of rayon staple fiber to the worsted system, combined with requirements for rayon-filament yarn for war production, is expected to reduce the quantities of rayon available for dress fabrics and other civilian uses. Raw materials for cotton goods are ample, but there is a bottleneck in carding and spinning capacity. Therefore various restrictions on less essential production have developed.

Restricted fabric production for civilian use signifies a reduced output of wearing apparel. As a result the number of workers required in certain garment industries will decline. The extent to which displaced garment workers can be absorbed into war industries is limited by problems of geographic mobility and training. New York City, for example, which is the center of women's garment production, is facing a major problem of wartime unemployment, for it has relatively few war industries to which garment workers can transfer.

Changes in Textile Employment, January 1940 to May 1942

The textile industry in December 1941 employed 1 out of every 7 wage earners in all manufacturing industries. After a decided slump early in 1940, total textile employment recovered during the last half of the year as the result of defense expenditures. During 1941 production and employment topped all previous records, as consumer purchasing power expanded and the Government placed heavy orders for military clothing. From the 1940 low point to the high in 1941, a 17-percent expansion in total textile employment occurred. Nearly 300,000 workers were added to the pay rolls, the greatest expansion being in mill and allied products industries. Men's wearing-apparel

¹ Assisted by Florence L. Schoenberg and Martha Ann Henderson. Prepared in the Occupational Outlook Division.

industries as a whole did not lag far behind, but employment in the women's apparel group rose only slightly. A minor decline in total textile employment has persisted since the 1941 peak. For the mill and wearing apparel totals the 3-percent reductions from the third quarter of 1941 to the second quarter of 1942 were negligible compared to their previous expansions.

TABLE 1.—Employment in Major Textile Groups, by Quarters, 1940 to 1942

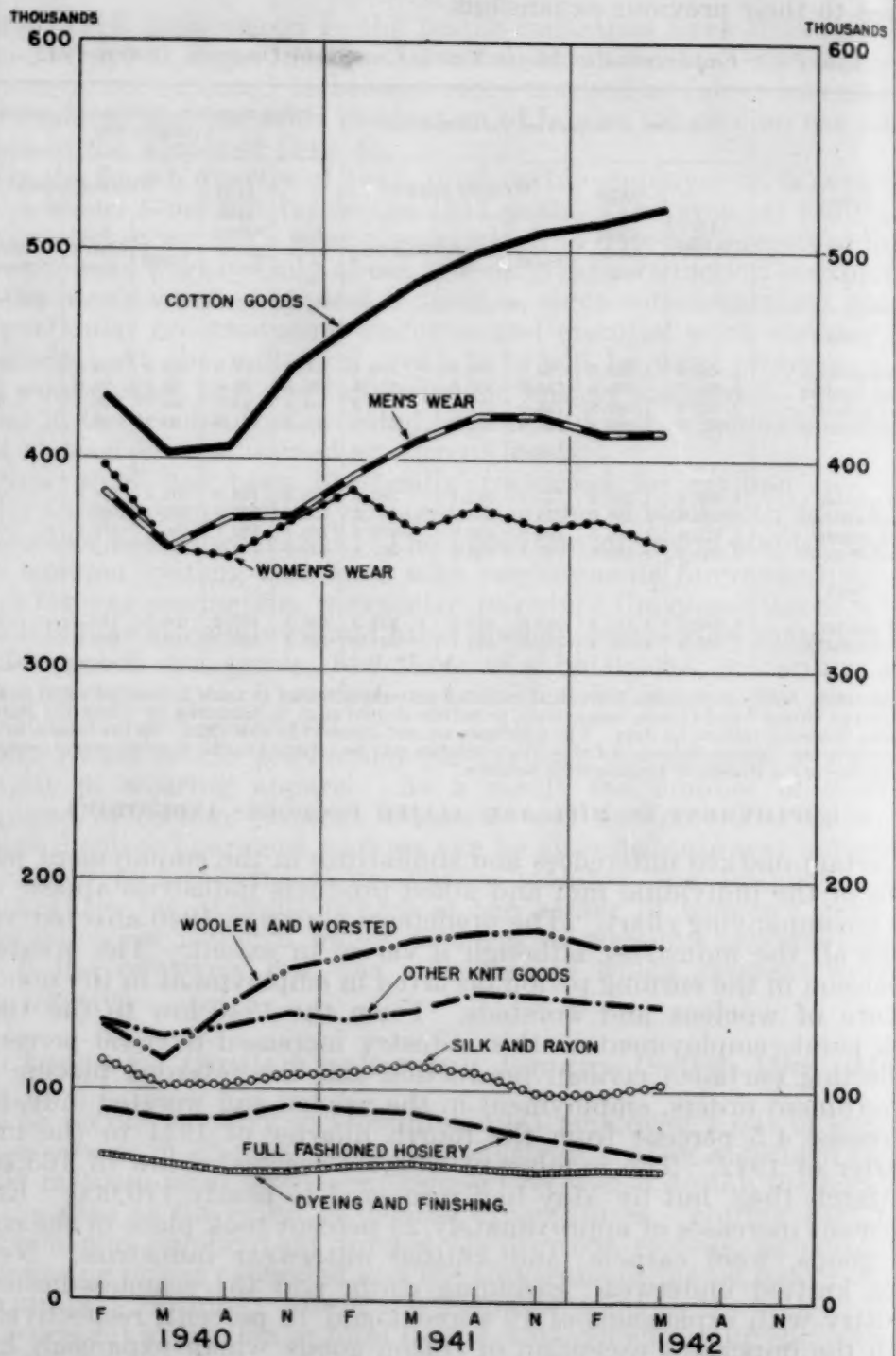
Period	Number of employees (in thousands) ¹					Index numbers (1939 census annual average=100)				
	All textiles	Mill and allied products	Wearing apparel			All textiles	Mill and allied products	Wearing apparel		
			Total	Men's wear	Women's wear			Total	Men's wear	Women's wear
1940										
First quarter.....	1,836.3	1,055.5	780.8	384.4	396.4	100.5	97.9	104.2	102.8	105.5
Second quarter.....	1,691.7	976.8	714.9	357.3	357.6	92.6	90.6	95.4	95.6	94.9
Third quarter.....	1,732.8	1,007.8	725.0	371.8	353.2	94.8	93.5	96.7	99.5	94.0
Fourth quarter.....	1,832.6	1,088.8	743.8	372.8	371.0	100.3	101.0	99.3	99.7	98.7
1941										
First quarter.....	1,898.1	1,120.4	777.7	392.1	385.6	103.9	103.9	103.7	104.9	102.6
Second quarter.....	1,933.0	1,158.0	775.0	408.3	366.7	105.8	107.4	103.4	109.2	97.6
Third quarter.....	1,975.8	1,176.0	799.8	420.8	379.4	108.1	109.1	106.7	112.6	101.0
Fourth quarter.....	1,956.4	1,169.0	787.4	420.0	367.4	107.0	108.4	105.0	112.4	97.8
1942										
First quarter.....	1,939.0	1,155.4	783.6	412.3	371.3	106.1	107.2	104.5	110.3	98.8
Second quarter.....	1,908.3	1,150.4	755.7	410.7	344.9	104.4	106.7	100.8	109.9	91.8

¹ The totals, built up from the individual industry aggregates shown in table 2, were adjusted to the 1939 Census Group 3 and 4 totals, respectively, to include employment in industries for which the Bureau of Labor Statistics collects no data. The estimates are not adjusted to 1941 data. In the future, in the absence of a 1941 Census, Bureau of Labor Statistics data will be adjusted to the unemployment compensation totals of the Bureau of Employment Security.

EMPLOYMENT IN MILL AND ALLIED PRODUCTS INDUSTRIES

Certain marked differences and similarities in the employment patterns of the individual mill and allied products industries appear on the accompanying chart. The predefense slump in 1940 affected virtually all the industries, although it varied in extent. The greatest expansion in the ensuing period occurred in employment in the manufacture of woollens and worsteds. From the 1940 low to the 1941 high point, employment in this industry increased over 50 percent. Reflecting curtailed civilian production and the retarded placing of Government orders, employment in the woolen and worsted industry decreased 4.5 percent from the fourth quarter of 1941 to the first quarter of 1942. The number of workers reached a low of 165,700 in March 1942, but by May had recovered to nearly 170,000. Employment increases of approximately 25 percent took place in the cotton goods, wool carpets, and knitted outerwear industries. Next came knitted underwear, including cloth, and the seamless-hosiery industry with expansions of 19 percent and 14 percent, respectively. With the important exception of cotton goods where expansion has continued, each of the above industries attained peak employment sometime during the last half of 1941. The subsequent declines were relatively minor, however, and in each case, except wool carpets, employment in the first half of 1942 was well above the predefense level.

EMPLOYMENT IN SELECTED TEXTILE INDUSTRIES QUARTERLY



UNITED STATES DEPARTMENT OF LABOR
BUREAU OF LABOR STATISTICS

In the full-fashioned hosiery, silk and rayon, dyeing and finishing, and hat industries, employment in the first half of 1942 was below the predefense level. Employment in the hat industry exhibited wide fluctuations, with a particularly sharp drop early in 1940. The marked downward trend after July 1941 reflected curtailed imports of felting skins from western Europe. Later, straw from the Far East became scarce. Presumably raw-material supplies, and hence employment, will be restricted for the duration of the war. The pattern of employment changes in the dyeing and finishing industry was quite distinct from all others. Over the entire period studied, the range of fluctuations was very narrow. A slight but noticeable downward trend has continued since the middle of 1941.

The earliest declines occurred in the silk-using industries, which were the first to feel the impact of economic warfare. With the cutting off of silk imports in late July 1941, curtailment of full-fashioned hosiery production and employment began. Now, a year later, the downward course is expected to continue. When, in the early months of 1942, the use of nylon was restricted to military purposes, the full-fashioned hosiery industry became dependent upon the Government allocation of rayon yarns for its major raw material. Relatively small quantities of sufficiently fine cotton yarns are available. Between May 1941 and May 1942 production of full-fashioned hosiery fell off 27 percent, while employment in the industry declined by 24 percent.

Between the second and last quarters of 1941 employment in the silk and rayon industry dropped 11 percent, as a result of the freezing of silk stocks. Thereafter the pattern differed markedly from that in the full-fashioned hosiery industry. Although the chief effect of the silk shortage was felt not by the weavers but by the independent throwsters, here and there the loss of silk for civilian woven fabrics may have led to temporary dislocations in weaving plants.² When rayon-weaving mills received contracts for silk and nylon parachute cloth, employment immediately rose in April 1942 above the first quarter average which had remained at the low point of late 1941. By May 1942 the number employed had increased 4 percent.

EMPLOYMENT IN MEN'S WEARING-APPAREL INDUSTRIES

Employment changes in some of the wearing-apparel industries continued to reflect to some extent the usual seasonal pattern. In other garment industries the expansion stimulated by defense expenditure eliminated any semblance of the former seasonal fluctuations.

The outstanding examples of almost uninterrupted expansion since the middle of 1940 are the men's tailored-clothing industry and the men's cotton-garment industries, with the exception of men's dress shirts and nightwear. Uniforms have been manufactured largely on the cotton-garment system. The shirt and nightwear plants experienced very little change in employment over the 2-year period. In the manufacture of men's neckwear and underwear, the extreme fluctuations in employment probably reflect a combination of seasonal and productivity changes. During the last 2 years the introduction of machines to stitch the seam of neckties led to considerable displacement of hand stitchers.

² The Census classified the throwsters with the silk and rayon industry although their main business in recent years has been the throwing of silk for hosiery.

TABLE 2.—Estimated Number of Employees in Specified Mill and Apparel Industries, by Months, 1940 to 1942¹

[In thousands]

Year and industry	January	February	March	April	May	June	July	August	September	October	November	December	Annual average
All textiles:													
1940	1,818.3	1,802.2	1,827.4	1,743.8	1,690.3	1,639.0	1,641.7	1,751.2	1,805.8	1,821.8	1,823.1	1,851.4	1,773.2
1941	1,844.2	1,910.9	1,940.2	1,942.7	1,932.9	1,929.0	1,942.7	1,995.2	1,995.2	1,978.5	1,948.4	1,943.8	1,942.0
1942	1,906.4	1,951.3	1,950.4	1,950.2	1,924.0	1,850.8							
Cotton goods:													
1940	436.0	433.4	417.8	411.6	402.1	393.6	398.4	402.0	415.6	431.0	444.8	455.5	408.3
1941	456.8	465.5	472.0	476.3	483.4	493.1	496.0	499.5	501.5	507.5	509.1	509.3	489.2
1942	510.5	513.9	515.3	519.5	520.6	521.4							
Woolen and worsted:													
1940	139.3	136.6	114.9	107.4	115.5	121.7	134.0	139.8	142.9	151.4	158.9	162.4	135.4
1941	160.7	165.1	165.2	167.7	171.9	173.6	175.4	175.2	177.8	176.2	176.0	178.1	171.9
1942	174.0	168.6	165.7	167.5	169.8	165.6							
Silk and rayon:													
1940	119.3	113.0	108.5	105.5	101.7	97.8	99.0	103.1	104.1	105.7	106.7	106.4	119.8
1941	106.1	108.5	109.6	111.6	111.6	112.7	112.9	110.5	102.7	100.9	99.5	99.1	107.1
1942	97.8	100.0	101.2	102.3	103.1	103.6							
Full-fashioned hosiery:													
1940	91.7	19.2	88.7	88.2	86.4	84.0	83.2	80.3	80.2	91.8	92.7	92.9	88.9
1941	90.5	90.5	91.6	91.6	90.5	88.5	87.6	85.0	79.6	79.1	78.3	78.4	86.0
1942	75.2	74.4	72.7	70.6	68.5	67.2							
Seamless hosiery:													
1940	62.3	64.5	61.4	61.9	57.0	55.6	57.5	59.6	59.4	61.3	62.6	63.7	60.6
1941	62.6	62.7	62.6	60.6	62.8	64.5	66.1	66.8	66.3	66.0	66.6	66.7	64.5
1942	65.4	65.4	65.3	63.8	62.6	61.5							
Knitted underwear and cloth:													
1940	49.2	49.9	50.7	49.6	48.1	47.7	48.2	49.4	50.3	51.7	51.3	51.6	49.8
1941	50.7	51.6	53.0	53.8	54.7	53.6	56.9	57.3	58.2	57.5	56.9	55.6	55.0
1942	55.4	56.4	57.5	58.2	57.9	57.4							
Knitted outerwear:													
1940	17.9	20.5	19.7	18.1	18.6	19.1	20.0	21.2	22.1	22.7	22.1	21.6	20.3
1941	20.0	19.3	19.3	20.2	21.7	22.4	22.8	23.0	23.3	23.4	22.7	21.9	21.7
1942	21.1	22.3	22.6	23.2	22.9	22.2							
Dyeing and finishing:													
1940	69.4	69.2	68.1	66.6	66.6	63.0	62.7	59.8	61.4	61.7	61.4	62.5	66.9
1941	62.7	65.0	66.1	66.7	65.7	64.8	64.6	63.4	63.2	62.8	61.9	62.6	64.1
1942	62.0	63.5	64.2	64.2	62.5	60.4							
Hat (except cloth and millinery):													
1940	16.2	16.3	15.4	11.6	11.8	12.7	14.8	15.4	15.4	14.3	14.6	15.0	14.5
1941	16.0	15.8	15.9	15.2	15.1	15.5	15.7	15.4	14.8	14.5	14.3	14.2	15.2
1942	13.7	13.7	13.4	12.8	10.9	22.2							
Carpets, wool:													
1940	26.7	26.7	26.0	25.8	24.6	22.8	23.0	23.2	24.7	25.9	26.6	26.8	26.2
1941	26.7	27.8	27.8	28.3	29.0	29.2	29.0	29.4	29.6	29.5	29.3	29.3	29.3
1942	26.8	28.3	28.4	29.3	29.4	29.2							
Men's and boys' suits, coats, and overcoats:													
1940	141.1	146.6	147.1	139.7	115.4	123.2	132.3	140.2	139.9	133.1	132.9	140.0	135.3
1941				140.9	148.7	149.6	152.1	153.7	154.0	154.3	150.7	152.4	150.6

Carpet, wool:	13.7	13.7	13.7	13.4	13.1	12.8	12.8	13.1	13.5	15.5	15.7	15.4	14.3	14.6	15.0	14.8	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	25.2	2
---------------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	---

¹ Derived from BLS monthly employment indexes for individual industries linked to the December 1939 Census wage-earner figure for each industry. See footnote 1, table 1.

² Includes the following 1939 Census classifications: House dresses, uniforms and aprons; women's children's and infants' underwear and nightwear of cotton and flannelette woven fabrics and of knitted fabrics.

^a Includes the following 1939 Census classifications: Women's and misses' blouses and waists; women's, children's and infants' underwear and nightwear of silk and rayon woven fabrics; women's and misses' clothing, n. e. c.; children's and infants' outerwear.

^a Includes the following 1939 Census classifications: Women's and misses' blouses and waists; women's, children's and infants' underwear and nightwear of silk and rayon woven fabrics; women's and misses' clothing, n. e. c.; children's and infants' outerwear.

EMPLOYMENT IN WOMEN'S WEARING-APPAREL INDUSTRIES

None of the women's wearing-apparel industries experienced employment expansions equal to those previously mentioned. The corset and allied garment industry evidenced a gradual rise in the number of workers, while employment in the heterogeneous group of women's and children's clothing industries not elsewhere classified³ showed a very slight upward trend. A less-than-seasonal decline occurred in late spring and early summer employment of the women's coat and suit industry, but the longer-run trend remained unchanged. No change of trend is discernible in employment in the women's cotton-garment industry. Actually, a marked downward trend in employment occurred in plants making dresses other than cotton wash dresses. A slight downward tendency is also noticeable in millinery employment.

To summarize: Until the middle of 1942, 7 months after the actual entry of the United States into the war, total textile employment showed relatively little decline from the 1941 peak. However, certain of the individual component industries experienced substantial curtailment of employment in this period. The combined reductions in the full-fashioned hosiery, silk and rayon, dyeing and finishing, wool carpets, hat, and a few wearing-apparel industries were nearly offset by expansions elsewhere.

Recession in Apparel Trades

During June and July 1942 a sharp decline in employment occurred as a result of widespread shut-downs in certain wearing-apparel industries. The General Maximum Price Regulation, which provided for the pricing of apparel at the retail level of March 1942, coincided with a lull in business following a period of overbuying in the early months of 1942. Clothing manufacturers claimed that increased labor costs and the higher cost of heavier and more expensive materials for fall lines made plant operations impossible. Simultaneously the price ceiling reduced the retailers' pressure for advance buying.

To correct these conditions, the Office of Price Administration issued several regulations. Effective May 29, 1942, Maximum Price Regulation No. 153 (Women's, Girls' and Children's Cloth Outerwear Garments) provided that garments of workmanship and quality equal to that of the fall of 1941 should be priced at 1941 fall levels. Almost immediately, as a result of arguments from the industry that costs were higher in 1942 than in 1941, the wording was revised, and Maximum Price Regulation No. 153 as Amended provided that prices should be set at cost plus the usual mark-up formula. In the same manner, Maximum Price Regulation No. 163 (Woolen and Worsted Civilian Apparel Fabrics) set prices for new and mixed fabrics. For the men's and boys' tailored clothing industry, Maximum Price Regulation No. 177 set retail prices at March 1942 levels. However, it set the manufacturers' and wholesalers' price at the level of a previous base period plus a percentage mark-up to allow for increases in cost of materials, trimmings, and direct labor.

Since the adjustment of these many problems was time-consuming, it was well into July before many manufacturers of outerwear were

³ See table 2, footnote 4.

ready to reopen their plants for business. Buyers, however, continued to withhold orders. The sharp decline in retail sales and the unprecedented high level of stocks in department stores, as evidenced by the Federal Reserve Board indexes, depressed the market. Business was expected to remain slow until the retailers were forced to stock their fall lines. Presumably, August employment in the industries manufacturing women's coats and suits, dresses, and men's tailored clothing should show considerable recovery.

Basic Factors Underlying the Employment Outlook

Since the advent of war the three major textile fibers—wool, rayon, and cotton—have become interdependent and must be considered together in evaluating the general textile-supply situation. The factors determining the supply of these fibers, however, are different. In each, the potential output is limited in some way; in each, the pressure of military and critical civilian demand varies.

APPAREL WOOL

The American entry into the war in December 1941 brought price control, allocations, and cuts in civilian uses to all wool-using industries. Although the total visible supply of wool on hand at the outset of 1942 was adequate to meet military requirements and basic civilian needs, a relative wool shortage did exist. The shortage arose from the fact that the United States is dependent on foreign sources for more than half of the wool supply. In order to guarantee the increased military needs for 1943, there must be a tremendous wool carry-over on hand at the beginning of that year. Therefore, continued strict conservation of wool for civilian uses is necessary. No matter how favorable imports may be at a particular moment, they are always subject to change.

The wool-conservation order M-73 limited total consumption of new wool for all purposes in the first quarter of 1942 to 80 percent of half the amount used in the first 6 months of 1941. Toward the end of the quarter the limit was lifted for plants operating exclusively on military orders. For civilian production a 50-percent limitation on the worsted system and a 40-percent limit on the woolen system remained effective.

In the second quarter of 1942, M-73 was further amended, removing all restrictions on plants producing exclusively military goods but reducing consumption of new wool for civilian purposes on the worsted system to 20 percent and on the woolen system to 10 percent of half the amount used in the first 6 months of 1941. The second-quarter order was extended through August 3, 1942.

Statistical reports from the mills indicate the effect of these restrictions. Although total consumption of new wool for all purposes increased during the first half of 1942 as compared with the first half of 1941, the consumption of new wool and mohair for civilian use was 66 percent less. Obviously, blending of fibers offered the only way to maintain civilian production. That a good start on blending was made during the first half of the year is indicated by the fact that the quantity of substitute fibers consumed on the woolen and worsted systems from January to June 1942 was almost twice that used in the first 6 months of 1941.

No yardage figures being available, poundage figures must be relied upon to indicate the extent of civilian shortages. During the first half of 1942 there was a 10-percent reduction from the corresponding period in 1941 in all fibers consumed for civilian fabrics on the woolen and worsted systems. The primary wool-using apparel industries—those manufacturing men's tailored clothing, women's coats and suits, and knitted outerwear—will feel the full effect of this 10-percent decrease when current fabric and yarn inventories are exhausted.

Beginning August 4th a modified form of M-73 was extended for 6 months. This extension drastically reduced the amount of new wool available for civilian all-wool fabrics but, by the introduction of a bonus blending system, it increased slightly over the second quarter the total amount of new wool available to manufacturers. For example, hereafter the worsted manufacturer who produces only all-wool fabrics will receive just half as much wool as he was allotted during the second quarter; while the worsted manufacturer agreeing to blend fibers will receive an additional allotment to be used in the production of fabrics of not more than 65 percent wool.

The implications of M-73 for civilian production are numerous. The order was drawn up to maintain civilian fabric yardage by encouraging all blending possible. But if civilian production in the last half of the year is to be maintained at its January-June 1942 rate, an amount of substitute fiber must be consumed equal to the total substitute-fiber consumption during all of 1941. It is unlikely that blending will be carried to its fullest possible extent. Therefore, as the year 1943 progresses the apparel industries will probably experience even greater shortages of civilian cloth than resulted from fabric restrictions in the first half of 1942.

RAYON STAPLE FIBER

Total United States production of rayon staple fiber will be greatly increased in 1942 over 1941. Because of a sharp decline in imports, however, net supplies available for distribution in 1942 will be increased by only about 16 million pounds, or 12 percent. Practically all of this increase will be absorbed by allocations already ordered to worsted manufacturers under M-73. Hence there will be no additional supplies for other civilian apparel.

Beginning in October 1942 rayon staple fiber will be allocated by Order M-176 which, it is estimated, may divert 40,000,000 pounds annually to the woolen and worsted systems. This together with pending military demands indicates for the year 1943 an actual decline in poundage available for such former uses as dress fabrics.

RAYON FILAMENT YARNS

A shortage of regular filament yarns for civilian wearing apparel is expected to develop. Although the total production of rayon filament yarn in 1942 and notably in 1943 will be increased over 1941, the conversion to high-tenacity yarns to be used in tire cord for military vehicles and in self-sealing gas-tank cloth will cause a decline in rayon producers' net supplies of regular filament yarns available for distribution. When exports to Latin America and diversion to full-fashioned hosiery by Government order are deducted from net supplies, the balance available to all former industrial users is still

further curtailed. Chief among the industrial users are the spinners and weavers of broad and narrow rayon fabrics to whom, in recent years, 80 percent of all rayon filament yarn was delivered.

During the year 1941 relatively little rayon cloth for military use was produced. In the spring of 1942, however, rayon weaving mills turned to silk and nylon parachute cloth. This industry's war production, including uniform linings, parachute-troop uniforms, neckties and handkerchiefs for the Navy personnel, cartridge and powder-bag cloths, is expected to equal 13.5 percent of total 1942 output, estimated from poundage of fibers to be consumed.

The total poundage of yarns for woven goods in 1942 will include all the silk and nylon required for military fabrics. So strategic are these latter yarns that processing for civilian goods, notably women's hosiery, is prohibited. With nylon and silk added to the reduced amount of rayon filament, the total quantity of yarn available to silk and rayon weavers in 1942 will be only slightly less than in 1941.

Hence employment in the silk and rayon industry in the last half of 1942 will equal or perhaps surpass the level attained in the second quarter after the letting of the parachute-cloth contracts.

At the same time the quantity of fabrics woven for civilian apparel must be curtailed because of the growing scarcity of regular filament yarns. The conversion of capacity to high-tenacity yarns will be accelerated in the last half of the year, thus reducing the net supplies of regular yarns for the weaving and knit-goods industries. Moreover, to ascertain the amount remaining for ordinary civilian uses, military requirements, Latin American allocations and, finally, diversion to full-fashioned hosiery must be deducted. Current estimates indicate that the quantity of rayon filament yarns available for civilian wearing apparel other than full-fashioned hosiery will be 10-15 percent less in 1942 than in 1941. In 1943 there will be a similar or greater reduction from the 1942 poundage. Hence a shortage of material is expected by late 1942, but more particularly during 1943, in some of the knit-goods industries and notably in plants which cut and sew women's apparel, for a very high proportion of filament yarn is used in women's wearing apparel.

COTTON GOODS

Despite the fact that this industry in 1942 is expected to surpass its own record production attained in 1941, certain fabrics for civilians will be scarce. The shortage will arise not from a scarcity of fiber but because of the limited capacity of cotton-textile equipment, notably carding and spinning machinery. To a less degree labor shortages threaten to become a limiting factor in certain areas.

The continuous expansion of activity in this industry, beginning with the first effects of defense spending in the last half of 1940, is well known. The estimated 10.5 billion linear yards, or 11.3 billion square yards, of cotton goods produced in 1941 represents a 25-percent increase over the 1939 Census total. In 1942, the War Production Board aims for a production of 12 billion linear yards.

In January 1942 there were only 300,000 more active spindles than in January 1941, but a significant increase in average running time had been effected. The average active spindle in January 1942 operated 114 hours per week as against 96.5 hours in January 1941.

The volume of employment expanded in each month of 1941. In January 1942 the number of employees was 12 percent higher than in the corresponding month of the previous year. The upward trend has continued, the May 1942 labor force exceeding 520,000 workers as compared with a total of about 510,000 in January.

Early in 1942 every effort was made to increase the production of duck to meet the vast military requirements. General Preference Order M-91 limited the use of duck to essential civilian products, with the remaining capacity concentrated on military output. In addition, tire plants were spinning yarn suitable for duck and some carpet looms had been converted to duck production.

Because of the threat to shipments of burlap from Calcutta, supplements for the Nation's bagging requirements had to be supplied by the cotton-goods industry. To this end, limitation order No. L-99 was issued on April 21. It required that an additional 20,000 looms, or 5 percent of the industry's total, be converted to the manufacture of osnaburg and bag sheeting.

On May 28th, the War Production Board ordered mills making combed yarn to earmark at least 40 percent of their medium-weight combed-yarn production and not less than 65 percent of their coarse combed-yarn production for the armed services. The effective date of this order, M-155, was postponed until November 1st.

The direct military demand in 1942 is estimated at 24 percent of the total cotton-goods output. Lend-lease requirements, production of burlap substitutes, and hospital needs will account for another 12 percent. Since the 1942 rate of production is running only 10 percent ahead of 1941, the remaining cotton goods available for all civilian uses in 1942 will be approximately 25 percent less than in 1941. Separate investigation of each of a long list of fabrics would indicate greater reductions for particular types.

A very wide variety of civilian apparel, household and industrial end-products may feel the effect of these shortages, but to varying degrees. Should a scarcity of fabrics for work clothing threaten, it would be corrected at once, by Government order if need be. The War Production Board would probably find such action inappropriate in the case of less essential civilian apparel.

Employment Outlook in the Textile Industries

The prevailing slight downward trend in total textile employment is expected to continue. By the fourth quarter of 1942 it is expected to be about 5.5 percent below the 1941 peak.

In this interval only a 3-percent decline in mill and allied products employment is expected. Reductions will be confined largely to the wool-carpet, hat, dyeing and finishing, and full-fashioned hosiery industries, and in a less degree to certain other knit-goods industries in which the use of strategic materials has been restricted. Employment in the woolen and worsted, rayon, and cotton-goods industries will either continue to expand or at least be maintained at current levels.

After military requirements and critical civilian demands are met, the quantities of the major textile fabrics remaining for civilian products in 1942 will be less than in 1941. Because of the unknown but probably large inventories of cloth on hand, these fabric shortages will not lead to substantial reductions in wearing apparel employment

until November and December of 1942. Although inventories may prove to be sufficient to delay the effect until the first months of 1943, it was assumed that the initial impact would come in the last 2 months of 1942. Furthermore the incidence of the expected fabric shortage will be uneven both as to extent and timing. The small manufacturer with poor contacts in the market will feel the pinch much sooner than the larger companies.

Altogether a 9-percent net reduction in employment in the wearing-apparel industries is indicated between the third quarter of 1941 and the fourth quarter of 1942. The most substantial curtailments (12 percent in total) are expected in the women's apparel industries, with some reduction anticipated in certain types of men's wear.

In the men's cotton-garment industry no fabric shortage will be permitted to interfere with the production of single trousers, washable service apparel, work clothing, work shirts, mackinaws, and sheep-lined leather jackets for the armed forces and for the greatly expanded civilian labor force.

The large diversion of combed cotton fabrics threatens dress-shirt and nightwear manufacturers. Neckwear and certain other men's furnishings will feel the cut in supplies of rayon filament yarns.

The men's tailored-clothing industry has had a relatively small proportion of Government contracts for uniforms. Traditionally dependent upon worsteds where blending is much less feasible than in woolen fabrics, this industry in particular will be adversely affected by the conservation orders limiting the amount of new wool for civilian fabrics. Rayon for linings will also be scarce. Hence, a decline in employment will result, although, until the slump during the early summer, monthly production and employment in 1942 were maintained at peak levels.

For some years a downward employment trend has existed in the dress industry. The expected shortage of rayon filament yarn for civilian fabrics will accentuate this decline, probably by November and December of this year. This rayon shortage will also effect employment in women's blouse, underwear, and nightwear plants.

The wool-conservation orders will result in a fabric shortage for the women's coat and suit industry when present inventories are exhausted.

Operations of the corset and allied garment industry may be among the first restricted by a scarcity of materials. On March 29, Order M-124 froze elastic thread and thereafter limited its use to surgical garments and defense products. As to stocks of elastic fabric on hand, by an amendment to Order M-174 on June 27th, a manufacturer may use only 10 percent as he sees fit, while the remaining fabric is restricted to health and war articles. Employment is expected to decline drastically.

As a measure of fabric economy the War Production Board issued so-called simplification orders for several wearing-apparel industries. By eliminating trouser cuffs and reducing the sweep of skirts, for example, a substantial amount of cloth will be conserved.

SITUATION IN NEW YORK CITY

The displacement of garment workers for the duration of the war will have a varying incidence among the different geographic areas where the needle trades are concentrated. Table 3 summarizes the

location data for the wearing-apparel industries. It will be noted that the apparel industries with the largest Government contracts—i. e., those making work clothing, single trousers, washable service apparel—are almost exclusively outside New York City. On the other hand those which will experience the most drastic dislocations are within the New York metropolitan area.

TABLE 3.—Percentage Distribution of Employees in Wearing-Apparel Industries, by Geographic Areas

Industry	North			South
	New York City	Other industrial areas	Outside industrial areas	
Men's and boys' suits, coats, and overcoats	22	1 59	11	8
Work clothing, single trousers, washable service apparel	3	2 30	32	11 35
Men's shirts (except work shirts) and nightwear	3	2 44	36	17
Men's and boys' neckwear and underwear	26	4 48	18	7
Women's and misses' dresses (except house dresses)	54	2 36	8	1
Women's coats, suits, and skirts (except fur coats)	55	6 37	7	2
Women's cotton garments	17	7 46	32	5
Women's and children's clothing, not elsewhere classified	39	8 41	19	2
Corsets and allied garments	29	9 49	21	1
Millinery	51	10 37	6	6

Source: Census of Manufacturers 1939.

¹ Chicago, Philadelphia-Camden, Rochester, Baltimore.

² Philadelphia-Camden, Boston, Scranton-Wilkes-Barre, Chicago.

³ Albany-Schenectady-Troy, Baltimore, Bridgeport-New Haven-Waterbury, Philadelphia.

⁴ Allentown-Bethlehem, Philadelphia-Camden, Chicago.

⁵ Chicago, Philadelphia-Camden, St. Louis.

⁶ Chicago, Los Angeles.

⁷ Providence-Fall River-New Bedford.

⁸ Philadelphia-Camden, Los Angeles, Chicago.

⁹ Chicago.

¹⁰ Bridgeport-New Haven-Waterbury, Chicago.

¹¹ Tennessee, Georgia, Texas, Virginia.

New York City suffers from a dearth of war work generally. The situation in this famed center of women's apparel production is in contrast with other important women's wear cities, such as Los Angeles, Philadelphia, and Camden, where booming war industries can absorb displaced garment workers. The New York apparel manufacturers cannot compete with the mass-production techniques of other areas in bidding for war contracts. This drawback has already been reflected in the relative decline of the New York apparel industries over the past 10 years. By the winter of 1942-43, unless corrective measures are taken promptly, the city's large unused labor supply will be increased by thousands of newly displaced garment workers.

Wartime Policies

RECOMMENDED OPTIMUM HOURS FOR MAXIMUM PRODUCTION

IN A joint statement of policy on July 28, 1942, eight Government agencies recommended that the workweek should not exceed six 8-hour days, or 48 hours, for workers in war plants. The proposal was designed to reduce "excessive working hours * * * which can not be sustained without impairing the health and efficiency of workers and reducing the flow of production." It was estimated that 1,500,000 war workers have been working more than 48 hours a week.

The recommendation does not affect the provision of the wage and hour law requiring payment of time and a half for overtime work after 40 hours.

The joint statement recommended to war contractors and other agencies a reexamination of hours and working conditions to improve worker efficiency and production. It was pointed out that in some cases offers of a large amount of overtime are being made as a means of "pirating" workers from other war plants.

The statement of policy sets forth four major standards: (1) For wartime production the 8-hour day and 48-hour week approximate the best working schedule for sustained efficiency in most industrial operations; (2) a scheduled day of rest for the individual, approximately 1 in every 7, should be a universal and invariable rule; (3) a 30-minute meal period is desirable; and (4) vacations are conducive to sustained production, and should be spread over the longest possible period.

The statement was signed for their respective agencies, by Robert E. Patterson, Under Secretary of War; Ralph Bard, Assistant Secretary of the Navy; Admiral Land, Chairman of the Maritime Commission; Paul V. McNutt, Chairman of the War Manpower Commission; Donald Nelson, Chairman of the War Production Board; Wayne Taylor, Under Secretary of Commerce; Dr. Warren F. Draper, Acting Surgeon-General; and Daniel Tracy, Assistant Secretary of Labor.

The text of the statement of the 8 agencies is as follows:

In view of the wide discrepancy in labor policy on hours of work among establishments—both private and governmental—working on war production, and in order to secure observance of those standards which experience shows are best for sustained maximum output, the following statement of policy is issued as a guide to Government establishments, to field representatives of procurement agencies, and to contractors working on war production.

Nothing herein contained in any way diminishes the urgency of securing round-the-clock, 7-day-week operation of plants and tools. The primary reason for this statement of policy is to secure increased production, by calling attention to certain practices that have been found to increase the efficiency of the human factor in production.

1. *Weekly day of rest.*—One scheduled day of rest for the individual, approximately every 7 days, should be a universal and invariable rule. The 7-day work-week for individuals is injurious to health, to production, and to morale. It slows down production because of the cumulative effects of fatigue, when not broken by a period of rest and relaxation, and it leads to increased absenteeism. Only in extreme emergencies and for a limited period of time should workers or supervisors forego the weekly day of rest.

2. *Meal periods.*—A 30-minute meal period in mid-shift is desirable for men and women from the standpoint of the worker's health and from the standpoint of productivity. In occupations that involve contact with poisonous substances workers must have time to wash before eating, as an elementary health precaution.

3. *Daily and weekly hours.*—Daily and weekly hours of employees in war production plants should be reexamined to assure those schedules which will maintain maximum output over a long war period. Hours now worked in some plants are in excess of those which can be sustained without impairing the health and efficiency of workers and reducing the flow of production.

When daily and weekly hours are too long the rate of production tends, after a period, to decrease, and the extra hours add little or no additional output; the quality of work may deteriorate during the whole period of work, not only during the hours of overtime; absenteeism rises sharply; the loss of time due to accidents and illnesses tend to increase. Effects upon the health and morale of the worker may be slow in appearing but are cumulative in nature. Irregular attendance disrupts the flow of production because certain operations call for a balance of trained forces. In order to conserve irreplaceable skilled and supervisory manpower, uneconomical schedules should be revised.

When plants drawing on the same labor market compete for labor through the device of offering heavy overtime payment the resulting unrest and turn-over interferes with war production. In order to stop this type of labor pirating there should be uniformity in the hours schedules of plants in the same industrial area.

While a 40-hour week is generally accepted in peacetime there is a widespread and increasing agreement as a result of actual experience, both in this country and abroad, that for wartime production the 8-hour day and 48-hour week approximate the best working schedule for sustained efficiency in most industrial operations. While hours in excess of 48 per week have proved necessary in some instances due to a limited supply of supervisory and skilled manpower, there has been some tendency to continue longer schedules after sufficient opportunity has been afforded to train additional key employees.

Plants which are now employing individual workers longer than 48 hours a week should carefully analyze their present situation with respect to output and time lost because of absenteeism, accident, illness, and fatigue. They should reexamine the possibilities of training additional workers now, in order to lessen the need for excessive overtime during the long pull ahead. As rapidly as is feasible these plants should introduce the hours schedules that will maintain the best possible rate of production for the duration.

4. *Vacations.*—The policy of providing opportunity for restoration of energy of employees by a vacation period away from the job is demonstrated to be conducive to sustained production and is even more sound under emergency conditions of industry today than in peacetime. Experience demonstrates that by providing regular opportunities for men to have a limited period of time away from the job makes it easier to control sporadic absenteeism.

Industry in planning vacation programs must exert the utmost ingenuity to obtain the benefits without paying an overbalancing cost in productive hours lost.

Vacations should be staggered and spread over the longest possible period. Vacations should not be permitted to excuse any shut-down of any department of any war-production plant except where such shut-down would not curtail production.



MANPOWER CONTROL TO PREVENT "PIRATING"

IN A statement of policy issued in July 1942 by Paul V. McNutt, Chairman of the War Manpower Commission, a method of relieving shortages of skilled labor and preventing piracy in critical areas was outlined. This statement, which was adopted by the Commission and by its Management-Labor Policy Committee, established a pro-

gram of agreement and cooperation among industry managements, labor unions, and Government agencies in war-industry labor-shortage areas. General standards and safeguards necessary in such programs are to be given in a supplemental statement to be issued after further consultation with the Management-Labor Policy Committee.

Purpose of Program

The policy statement pointed out that thousands of skilled workers are required in the rapidly expanding war industries. In certain occupations there are not enough skilled workers to meet the immediate and future requirements of war industries. This shortage of skilled workers has created needless labor turn-over and uncontrolled migration of skilled labor. Such turn-over and migration result in wasteful and ineffective utilization of skilled workers, which is likely to impede the war production program to an increasing extent in those areas in which such production is concentrated. The principal aim of the program, therefore, is to prevent the luring of skilled workers away from war industries and plants.

Prevention of Pirating

The plan formulated by the War Manpower Commission contemplates the cooperation of management, labor unions, and Government agencies in order to prevent pirating of workers. However, in war industries where labor, management, and Government do not agree on means of stopping this practice, the Chairman of the Commission will take steps designed to stop the "raiding" of workers in certain skilled occupations. He will designate areas of shortage as "critical labor areas" and specify within them "critical occupations" and "essential war production activities." Such jobs will be filled only through methods approved by the Government. The specific "critical labor areas" to be selected will be in industrial districts in which there exist great shortages of workers.

Protection of Workers

The cooperative plans will prevent solicitation and hiring of certain skilled workers away from war plants. However, such plans will contain prohibitions against the blacklisting of individuals, the violation of union agreements, or the retention of a worker at substandard wages or working conditions. No compulsion is to be placed upon employees to prevent their changing their jobs. Instead, pressure will come only through the procedure which employers are required to observe. As a further method of protecting workers, the Commission will establish appeal bodies to which aggrieved parties, either employers or employees, may appeal for redress.

Critical Labor Areas

If the maximum utilization of the manpower in a designated area has been or is likely to be impeded, a representative of the War Manpower Commission is required to confer with management and labor representatives on critical problems of the area, and with regional or

local representatives of affected Federal agencies. The purpose of this conference is to secure "the concurrence of all affected parties in a cooperative plan for the effective recruitment and utilization of workers in such area, and for the effective elimination of practices which result in the withdrawal of workers from employers engaged in essential activities in such area."

Upon receipt of a report from the Commission representative of such a cooperative plan, or a report that such a plan has been sought but has not been concurred in by all affected parties "with reasonable promptness," the Chairman will designate the area as a "critical labor area." He will also designate the "critical occupations" and "essential war production activities" in that area.

Solicitation of Employees

After the publication of the notice by the Chairman with respect to a given area, employers are forbidden to "solicit (for the purpose of hiring) or hire, within or without such critical labor area, for work to be performed wholly or principally within such area or solicit (for the purpose of hiring) or hire, within such critical labor area, for work to be performed wholly or principally without such area," any of the workers covered by the Chairman's notice, except through the United States Employment Service, or under conditions approved by the War Manpower Commission, or under a cooperative hiring plan.

Appeals

Any person or group of workers or employer, dissatisfied with any action taken or not taken, will be provided an opportunity to appeal to a War Manpower Commission management-labor committee to be established in each designated "critical labor area." This committee will be composed of representatives of unions and industry managements in the area. It will make recommendations in such cases to the area representative of the War Manpower Commission. If a disagreement is not settled by this procedure, appeals may be taken to regional management-labor committees, and thereafter to the National Management-Labor Policy Committee in Washington.



LABOR POLICY FOR GOVERNMENT PLANTS

IN A statement of principles, endorsed by representatives of the American Federation of Labor and the Congress of Industrial Organizations, the War and Navy Departments, on July 18, 1942, outlined a labor policy for Government-owned, privately operated munition plants. This policy, affecting nearly 100 large munitions plants, was evolved over a period of months in collaboration with representatives of organized labor, including President William Green of the American Federation of Labor, President Phillip Murray of the Congress of Industrial Organizations, Joseph A. Padway, general counsel of the A. F. of L., Henry Kaiser of the A. F. of L., Lee Pressman, general counsel of the C. I. O., and Allan S. Haywood, C. I. O. organization director.

The statement provides that the selection of a bargaining agent will be deferred until a majority of the estimated number of employees in any appropriate unit have been hired. The policy also guarantees that no employee or person seeking employment shall be discriminated against by reason of race, color, creed, or sex, and creates procedures in establishing wage scales, handling grievances, protecting plants against sabotage, and guaranteeing the rights of discharged employees.

A summary of the statement of policy follows:

Statement of Policy

Congress has charged the War and Navy Departments with the responsibility for the operation of nearly 100 Government-owned munition plants, the backbone of the Nation's armament program. In order to utilize fully the labor and management resources of the Nation and to minimize encroachment upon the country's industrial structure, these plants are being operated through selected qualified contractors. These plants embody a new and unique tripartite relationship among Government, labor, and management, and are sufficiently different from traditional Government establishments so that existing Government policies regulating labor relations are not entirely suitable.

Recognizing these facts, and "desiring to preserve the greatest freedom of organization and collective bargaining by the employees which is compatible with the necessary discharge by the War and Navy Departments of their responsibility for maximum production and the safe and efficient operation of these plants," the War Department and the Navy Department have established the following labor policies to which the American Federation of Labor and the Congress of Industrial Organizations have agreed. It is recognized, however, that these policies do not cover all aspects of labor relations in these plants, and experience may indicate the desirability of modifying, adding to, or otherwise amending this statement of policy.

DISCRIMINATION PROHIBITED

The statement of policy provides that no employee or person seeking employment shall be discriminated against by reason of race, color, creed, or sex.

COLLECTIVE BARGAINING

The recognition of an exclusive bargaining agent for the employees in any appropriate bargaining unit within any plant will be deferred until a majority of the estimated total of that unit has been hired, unless special circumstances justify an earlier designation of such exclusive bargaining agent. However, provision will be made for the handling of grievances and other disputes, and the elimination of friction between employees and management during the period pending the determination of an appropriate bargaining agent.

SENIORITY

Seniority shall be a determining factor in matters affecting lay-off and reemployment, transfers, demotions and promotions, only if other factors of ability and aptitude are equal.

APPEALS PROCEDURE IN CASE OF DISCHARGE

Discharges directed by the War or the Navy Department because of suspicion of subversive activities will be handled in accordance with the provisions of the "Joint Memorandum on Removal of Subversives from National Defense Projects of Importance to Army or Navy Procurement," dated January 10, 1942.

Discharges directed by the Army or Navy officer in charge, in the interest of plant security, will be handled in the following manner:

(1) The officer or his representative will direct the contractor to suspend the employee in question immediately; (2) the employee will be advised in detail of the specific reasons for his suspension and of his right to a hearing; (3) if requested, a hearing will be held by the officer, or his representative; (4) based on such hearing, the officer or his representative will direct the reinstatement (with authority to grant back pay) or the discharge of such employee; and (5) an employee so discharged will have the right, upon request, to have his case reviewed by the War or Navy Department.

Discharges effected by the contractor or his representatives for violation of plant rules, inefficiency, or other reasons are subject to review through the established grievance procedure.

RESTRICTIONS ON EMPLOYER-EMPLOYEE AGREEMENTS

No agreement between the management and its employees, or their representatives, except those which affect the safety and health of employees, may be entered into, or action taken, which, in the opinion of either the Secretary of War or the Secretary of the Navy, will have the effect of restricting or hampering maximum output.

ANTISABOTAGE PROVISIONS

Antisabotage, antiespionage, and plant protective measures, including access into the plant, approved or prescribed by the War and Navy Departments, are binding upon management, and employees and their representatives. Regulations designed to guard against sabotage, espionage, and subversive activities, and other plant protective measures, shall be posted throughout the plant and otherwise made available to employees. Violations of these regulations or measures are grounds for disciplinary action, including immediate dismissal.

WAGE DETERMINATIONS

As the War and Navy Departments generally have contractual responsibility for the approval of all costs, including pay-roll costs, these departments will from time to time jointly agree upon the policies to govern the exercise of these contractual responsibilities to approve or disapprove proposed wage scales.

Before operations commence at any plant, the contractor must prepare a wage scale to apply upon the commencement of operations, and submit it to the War or Navy Department for approval. Any subsequent adjustments in the initial wage scale at any plant are to be worked out by the contractor and the employees through established procedures, subject to the approval of the War or Navy Department.

CONFLICTS WITH EXISTING CONTRACTS

The statement of policy is applicable to all plants, except that where any provision of the statement conflicts with a provision in an existing contract, such contract will not be altered except by mutual consent.



POLICY OF NONDISCRIMINATION IN EMPLOYMENT OF ALIENS

AS A means of utilizing the labor force to the fullest possible extent, the President issued on July 13, 1942, a statement intended to prevent discrimination in the employment of aliens. The statement explained the circumstances in which aliens may not be employed without permission in war industries. It declared, however, that except in such situations persons should not be refused employment solely because they are aliens.

The statement outlined procedures to be followed where special permission is required for the employment of aliens. It also instructed the Fair Employment Practice Committee to entertain complaints of discrimination against aliens in employment and to take appropriate action to end such discrimination.

The President pointed out in his statement that there are no restrictions on the employment of any person in nonwar industries, and that there are none against employment even in war industries, if the particular labor is not on "classified" contracts, which include secret, confidential, restricted, and aeronautical contracts.

The statement of the President follows:

1. Persons should not hereafter be refused employment, or persons at present employed discharged, solely on the basis of the fact that they are aliens or that they were formerly nationals of any particular foreign country. A general condemnation of any group or class of persons is unfair and dangerous to the war effort. The Federal Government is taking the necessary steps to guard against, and punish, any subversive acts by disloyal persons, citizens as well as aliens.

2. There are no legal restrictions on the employment of any person (a) in nonwar industries, and (b) even in war industries, if the particular labor is not on "classified" contracts, which include secret, confidential, restricted, and aeronautical contracts.

The laws of the United States do provide that in certain special instances involving Government contracts an employer must secure from the head of the Government department concerned permission to employ aliens. Section 11 (a) of the Act of June 28, 1940 (Public No. 671, 76th Congress, 3rd Session) contains a provision that—

"No aliens employed by a contractor in the performance of secret, confidential, or restricted Government contracts shall be permitted to have access to the plans or specifications, or the work under such contracts, or to participate in the contract trials, unless the written consent of the head of the Government department concerned has first been obtained * * *"

The Air Corps Act of 1926 has a similar provision:

"* * * no aliens employed by a contractor for furnishing or constructing aircraft parts or aeronautical accessories for the United States shall be permitted to have access to the plans or specifications or the work under construction or to participate in the contract trials without the written consent beforehand of the Secretary of the Department concerned."

There are no other Federal laws which restrict the employment of aliens by private employers in national war industries. There are no Federal laws restricting the employment of foreign-born citizens of any particular national origin.

3. Where, under the law, permission to employ aliens is required from the War and Navy Departments, the alien shall go to the nearest office of the United

States Employment Service, which will furnish him with application form, and assist him in filling it out. The completed form will then be submitted by the alien to the employer who will fill out the reverse side of the form, and then immediately forward same to the Department concerned. Upon receipt of the application, the Department will act promptly thereon, in the normal case within forty-eight hours, and give its approval or disapproval, either of which shall be subject to change at any later time.

4. In passing upon applications for permits, the Department will give special and expedited consideration to nationals of United Nations and friendly American Republics, and any other aliens, including enemy aliens, who come within the following categories:

A. Aliens who have served in the armed forces of the United States and have been honorably discharged.

B. Aliens who have, or who have had, members of their immediate family in the United States military service.

C. Aliens who have resided in the United States continuously since 1916 without having returned to the country of origin within the last 10 years.

D. Aliens who have married persons who, at the time of marriage, were citizens of the United States and who have resided in the United States continuously since 1924 without having returned to the country of origin within the last 10 years.

E. Aliens who have declared their intention to become citizens of the United States and who had filed petitions for naturalization before December 7, 1941.

5. Any inquiries or complaints by aliens, pertaining to specific instances of discrimination, or intentional failure to carry out the above procedure, should be referred directly to the Committee on Fair Employment Practice, Washington, D. C. This Committee will consider the complaints and take such action as may be warranted in the particular case.

6. Any information concerning disloyal activities in war industries or elsewhere, or indications of disloyalty on the part of persons employed in war industries should be reported immediately to the nearest office of the Federal Bureau of Investigation. Employees have the same duty in this matter as have employers.



CANADIAN WAGE AND COST-OF-LIVING ORDER OF JULY 1942

EXPERIENCE of the Canadian National War Labor Board with the administration of the Wartime Wages and Cost-of-Living Bonus Order adopted in 1941 showed the need for consolidating and strengthening its provisions. A new order in council—known as the Wartime Wages Control Order—was therefore issued on July 10, 1942, which, it is stated, does not change the principles previously laid down, but is, in effect, a restatement of the Government's wartime wages policy, supplemented by certain details. All of the features of the earlier order are retained through revision and consolidation, and the changes made are for the purpose of securing proper enforcement of the terms. As the principles of the original order were retained, it was unnecessary to alter administrative procedure as regards wage control or the application of the cost-of-living bonus payments as already established. The chief provisions of the order for stabilizing wages and establishing enforcement machinery are given below.

Administration

Administration is vested in the National War Labor Board. The membership of this Board is unchanged and consists of a chairman and 4 or more representatives each of employers and employees. The chairman is an appointee of the Governor in Council, and holds office indefinitely. Members are also appointed in the same manner,

but on the recommendation of the Minister of Labor after consultation with employer and employee organizations. A quorum consists of the majority of the members. An executive committee, consisting of the chairman and 2 other members to be selected by the Board, may exercise any powers conferred upon it by the bylaws.

Powers of the National Board include the following: Administration of (1) the order establishing the Board, (2) order in council 7679, issued in October 1941 and dealing with minimum-wage rates paid by contractors and subcontractors engaged in the manufacture of supplies for the Canadian Government, and (3) the Fair Wages and Hours of Labor Act of 1935; supervision of the regional war labor boards; and such other duties as may be assigned to it by either the Governor in Council or the Minister of Labor. As directed by the Minister of Labor, the National Board must investigate wage conditions and labor relations and periodically make such recommendations as it may deem necessary.

The 9 regional war labor boards (representing the 9 Provinces) each have a chairman and 1 or more representatives of employers and employees, respectively. Duties are assigned to the regional boards by the National Board. Under the original order, 5 regional boards were provided for, namely, one each for the Provinces of Quebec, Ontario, and British Columbia, one for the Maritime Provinces, and one for the 3 Provinces of Manitoba, Saskatchewan, and Alberta taken together.

Wage-Control Provisions

COVERAGE

Coverage of the order extends to employees of any employer in Canada or on board any ship if its crew is ordinarily engaged in ports of Canada. An employer is defined as any person, firm, or corporation employing any person, and includes officers of the Crown in Canada, with specified exceptions such as the Provincial and municipal governments, charitable bodies, and persons engaged in agriculture, horticulture, fishing, hunting, or trapping. Employee means any person employed by an employer under a contract of service, who receives wages or salary of less than \$175 monthly (excluding cost-of-living bonus) or who receives more than that amount but is not above the rank of foreman or comparable rank. Persons in domestic service in a private home, or engaged casually otherwise than for the purpose of the trade or business of the employer, are excluded.

In general, an employee is a person in any office, factory, shop, or enterprise, whether the compensation is called wages or salary, whose primary function is the performance of work that is not supervisory and who is below the rank of foreman or comparable rank; or who supervises other employees in the capacity of foreman or comparable employee, provided he does not in either case discharge duties and responsibilities of an executive character.

A person who is paid wages or salary (excluding cost-of-living bonus) at a rate of \$250 or more a month is deemed to be above the rank of foreman or comparable rank, and therefore is excluded from coverage of the order, unless it is clearly indicated that he is not above that rank. Cases of dispute or doubt as to the rank of an employee or employees must be decided by the National Board.

The National Board may also exclude from any of the provisions of the order any employer or employee, or any class of employers or employees, or any employers or employees in any area, if administration is impracticable or it is not in the public interest to include such persons or classes in coverage. The Wartime Prices and Trade Board must concur in the decision.

WAGE RATES

No employer may decrease a range of wage rates or a single wage rate calculated on a time or commission basis below the level paid by him on November 15, 1941, except with the written direction or authorization of the National Board. Such wage rates are defined as those "calculated solely on a basis of time worked or solely as a commission, or calculated with respect to part thereof on a basis of time worked and with respect to the remaining part thereof as a commission."

Changes in incentive-wage rates below the level of November 15, 1941, are also subject to the same authorization except as follows:

21. An employer may, without a direction or authorization from the National Board,

(i) change a range of wage rates or a single wage rate, calculated on an incentive basis, forming part of the basic scale of wage rates paid by him on November 15, 1941,

(a) if such change is made to compensate for the addition, removal, or alteration of a work element forming part of the operation, series of operations or job or position in respect of which such range of wage rates or single wage rate is paid and is commensurate with such removal, alteration, or addition; and

(b) if that portion of the employer's cost of production representing the labor cost of such operation, series of operations, or job or position is not increased; and

(c) if a flat rate or time rate or a range of such rates is used in conjunction with a piece rate or other incentive rate in such range of wage rates or single wage rate, if such flat rate or time rate or range of such rate is not increased or decreased and is retained as part of such range of wage rates or single wage rate.

(ii) convert a wage rate paid on November 15, 1941, calculated on a time or commission basis to a wage rate calculated on an incentive basis if the employer was, on November 15, 1941, paying wage rates calculated on such an incentive basis and if the conversion is effected in accordance with the same method of calculation followed by such employer in calculating the wage rates on such incentive basis.

In fixing the rate of pay for a new job, position, or an occupational classification not maintained on November 15, 1941, or in new establishments or sites of operation, the employer must obtain written direction or authorization from the National Board, and may not pay less nor more than the rate paid to other employees of like ranking unless so authorized.

In special cases, an employer may either increase or decrease the wage rate paid to an employee without a direction or authorization from the National Board. Increases may be made—

24. (1) * * * (i) within the limits of the range of wage rates paid by the employer on November 15, 1941, or paid thereafter pursuant to a direction or authorization of the National Board, in respect of the job or position occupied by such employee or the occupational classification in which such employee is engaged; or (ii) upon the promotion of the employee from one job or position to another job or position or from one occupational classification to another occupational classification, if the increased wage rate is the single wage rate or is within the range of wage rates paid by the employer on November 15, 1941, or paid thereafter pursuant to a direction or authorization of the National Board in respect of the job, position, or occupational classification to which such employee is promoted.

Decreases are permissible after consultation with an employee or his representative and subject to all other provisions of this order to an employee, as follows:

(2) * * * (i) within the limits of a range of wage rates paid by the employer on November 15, 1941, or paid thereafter pursuant to a direction or authorization of the National Board, in respect of the job or position occupied by such employee or the occupational classification in which such employee is engaged; or (ii) upon the demotion of the employee from one job or position to another job or position or from one occupational classification to another occupational classification, if such decreased wage rate is the single wage rate or is within the range of wage rates paid by the employer on November 15, 1941, or paid thereafter pursuant to a direction or authorization of the National Board, in respect of the job, position, or occupational classification to which such employee is demoted.

Broad powers are granted to the National Board to direct that wage payments shall be increased over the level of November 15, 1941, if in its opinion the change is justified by the circumstances. For example, if a worker is paid less than other workers doing the same or substantially similar work in the locality or a comparable locality, the increase may be authorized. A change may be ordered from one method of wage payment to another, or from a range of wage rates to a single wage rate, and vice versa. The National Board may authorize or direct an employer to alter any term of employment including any rule, regulation or practice governing the working conditions of his employees which has the effect directly or indirectly of increasing wage rates paid by the employer on November 15, 1941, if, in its opinion, the change is fair and reasonable and is consistent with the principles of this order, having regard to all the pertinent circumstances. Where the basic scale of wage rates paid by an employer on November 15, 1941, is high in relation to the rates prevailing for the same or similar work in the locality or in a locality that is comparable in the opinion of the National Board, the Board may direct that the cost-of-living bonus described below shall be deferred in respect to the employees affected or adjusted to a reasonable level.

In the application of the terms of the present order relating to wage rates the employer is not exempt from compliance with the terms of order in council 7679 of October 4, 1941, dealing with wages paid by Government contractors and subcontractors, but if the latter order ceases to be applicable the wage rates observed are to be those previously in effect, unless otherwise directed by the National Board.

The National Board may substitute in its discretion ranges of wage rates for any schedule of rates issued under the provisions of the Fair Wages and Hours of Labor Act of 1935, and may direct the payment of a cost-of-living bonus in addition. Increases in rates may also be authorized where those established under the act are lower than the fair minimum, and the employer must increase rates accordingly. However, no employer may, by reason of any such schedule, decrease any rates paid by him on November 15, 1941. Upward revision is confined to jobs, positions or occupational classifications for which schedules have been issued pursuant to the Fair Wages and Hours of Labor Act, 1935, and only during the period to which the schedule applies. If the National Board deems it fair and reasonable it may authorize an employer to pay higher wage rates than are established by schedule pursuant to the act; or direct the establishment of a range or ranges of wage rates in any schedule of wage rates issued

pursuant to the act which established only minimum fair wage rates; or direct the payment of a cost-of-living bonus in addition to the wage rates.

Cost-of-Living Bonus

Payment of a cost-of-living bonus may be made only pursuant to a direction or authorization of the National Board, and unless otherwise specified all employers are obliged to comply with such an order. General cost-of-living orders are to be issued in accordance with the following provisions:

34. (1) The National Board shall, on or before the 15th day of February, May, August and November, respectively, in each year, by a general order, fix the amount of increase or decrease, if any, required to be made in cost-of-living bonuses being paid by employers, or the amount of a cost-of-living bonus, if any, to be paid by employers who are not, at the time of such order, paying cost-of-living bonuses, such increase or decrease or such payment to be made commencing with the first payroll period beginning on or after the date specified in such order.

(2) The amount of the increase or decrease, or the amount of the cost-of-living bonus to be paid, shall be calculated by the National Board for the purpose of such general order in the matter hereinafter set out in respect of the rise in the cost-of-living index number for the month prior to such order above the cost-of-living index number for the month of October, 1941.

(3) The National Board may direct any employer to pay a cost-of-living bonus calculated on the rise in the cost-of-living index number above the index number for such month prior to the month of October, 1941, as such Board finds fair and reasonable, but not, in any event, earlier than the effective date of the last general increase in wage rates paid by such employer and not earlier than August 1939, whichever is the later.

(4) No general order shall be made under this Section by a Regional Board.

35. (1) A general order of the National Board shall state—

(i) with respect to employers paying cost-of-living bonuses (a) the amount of money per week by which cost-of-living bonuses paid to adult male employees, and to other employees employed at weekly wage rates of \$25 or more, are to be increased or decreased; (b) the percentage of the weekly wage rates by which the cost-of-living bonuses paid to male employees under 21 years of age employed at weekly wage rates of less than \$25, and to female employees employed at weekly wage rates of less than \$25, shall be increased or decreased;

(ii) with respect to employers who are not paying cost-of-living bonuses (a) the amount of money per week, if any, to be paid to all adult male employees and all other employees employed at weekly wage rates of \$25 or more; (b) the percentage of the weekly wage rates, if any, to be paid to male employees under 21 years of age employed at weekly wage rates of less than \$25 and to female workers employed at weekly wage rates of less than \$25.

(2) A general order by the National Board may be published by way of advertisement in any newspaper or newspapers selected by it, and any advertisement in any newspaper purporting to contain such a general order and purporting to be inserted by the Chairman of the National Board shall be evidence of the making by the National Board of any general order therein set out.

No employer may increase a bonus if it is in excess of a cost-of-living bonus properly calculated in accordance with the provisions of the order.

The normal number of working hours, excluding overtime, is made the base for calculating weekly wage rates. If board or shelter or both form a part of the weekly wage rate they are to be calculated for at the following rate:

	Per Week	Per Month
Food and shelter.....	\$6. 00	\$26. 00
Food only.....	4. 50	19. 50
Shelter only.....	1. 50	6. 50
Individual meals or shelter for one night.....each..	. 25	-----

If a different method of calculation has been used and accepted for other Government purposes, it may be substituted. No cost-of-living bonus is payable to an employee for overtime work. If an employee works less than a full-time week, the bonus is adjusted proportionately. The National Board may in any case provide for an hourly bonus rate, if no such payment is made for overtime. However, no such direction may be made by a regional board.

An employer may be exempted from paying the cost-of-living bonus or any part of it if the National Board finds he is financially unable to do so, and the Board will determine the amount, if any, that he is to pay. Variations in the amount of the bonus, upward and downward, may be authorized by the Board with respect to different groups of employees of an employer, provided that the total amount and cost shall not be higher than the cost-of-living bonus properly calculated on the regular basis. Changes may be made by the Board in the amount of bonus any employer is ordered to pay, having regard to the cost-of-living bonuses being paid by other employers pursuant to any general order of the Board. The Board is empowered to increase or decrease bonuses or alter the beginning date within its discretion; but no regional board may make such a direction.

Alterations in the bonus are based on changes in the cost-of-living index prepared by the Dominion Bureau of Statistics for the month preceding the month of the order, according to the following method:

48. * * * (i) the rise or fall in the index shall be measured in points to the nearest one-tenth of one point after the index has been adjusted to the base of 100.0 for August, 1939;

(ii) the increase or decrease shall be calculated from the cost-of-living index number of the month of October 1941, namely, the adjusted index number of 114.6;

(iii) for each rise of 1 point in the index, the amount of the bonus or the increase in the amount of the bonus, as the case may be, and for each fall of 1 point in the index the decrease in the amount of the bonus shall be (a) 25 cents per week for all adult male employees and for all other employees employed at weekly wage rates of \$25 or more, and (b) 1 percent of the basic weekly wage rates for male employees under 21 years of age employed at weekly wage rates of less than \$25 and for female employees employed at weekly wage rates of less than \$25;

(iv) the amount of the bonus shall not be changed unless the cost-of-living index number has changed 1 whole point or more since the last general order of the Board requiring an increase or decrease in the amount thereof.

An order of the National War Labor Board, effective on or after August 15, 1942, varied the cost-of-living bonus to allow for a change in the cost-of-living index number. On July 2, 1942, the index was 117.9 (adjusted index, 117). This represented a 2.4-point rise from October 1, 1941, when the index was 115.5 (adjusted index, 114.6). Therefore, the cost-of-living bonus was ordered not to exceed \$4.25 per week or 17 percent of the weekly wage rate.

General Provisions

Other provisions of the order deal with the power of the National Board to determine the methods of wage payment observed by employers on November 15, 1941, the basis of calculation, and the employer's duties under the present order. All determinations and decisions shall be final and conclusive.

Any employer found guilty of an offense against the terms of the order is liable to a fine of from \$100 to \$5,000. Each offense is

penalized separately. Any employer who discharges or threatens to discharge an employee or who discriminates against him for furnishing information under this order is guilty of an offense. No prosecution may be commenced without written consent of the National Board.

Applications for any declaration, order, or determination may be made by an employer or by or on behalf of an employee. The power to make directions, etc., implies the right to rescind, revoke, amend or vary them. Any employer who paid to his employees a voluntary periodical bonus, other than a cost-of-living bonus, prior to November 15, 1941, may continue or discontinue it, at his will. If the payment is continued, it may not exceed the rate established by practice prior to the year ending on November 15, 1941. No employer may inaugurate a bonus plan subsequent to that date.

Operations of the National Joint Conference Board of the Construction Industry are not affected by the order under review except in respect to changes in ranges of wage rates or single wage rates forming part of the basic wage scales and to cost-of-living bonuses paid by employers in the construction industry.

Wage scales, adopted under a collective agreement, that are comparable to rates paid to similar employees outside Canada may be increased in the discretion of the Board in accordance with any increase granted for comparable employment outside Canada. In any such case no cost-of-living bonus is to be paid to any affected employee. Regional boards are barred from making such directions. Provisions of collective agreements that are inconsistent with the terms of the present order must be brought into line with it. Notwithstanding provisions of a collective agreement, either party to it may apply to the National Board for revision or suspension of its terms directly or indirectly affecting wages, and the Board may authorize a change, insofar as this is not inconsistent with the order. A record is required to be kept by the Board of such modifications.

Finally, provisions of the Wartime Wages Control Order supersede any inconsistent provisions of any Dominion or Provincial law, order or regulation, but nothing in this order may be construed to deny to employees cost-of-living or other benefits to which they were entitled on November 15, 1941.

Employment and Labor Conditions

COMPANY POLICIES ON MILITARY AND CIVILIAN SERVICE OF EMPLOYEES

THE drafting and enlistment of large numbers of men has resulted in the adoption, by many companies, of policies designed to protect the rights and privileges of their employees while they are in the armed services. Since the enactment of the Selective Training and Service Act in 1940 the National Industrial Conference Board has issued three reports dealing with these policies and showing the adjustments made with the extension of the military-service period and the development of civilian defensive services. Its most recent study¹ analyzes the policies of companies regarding compensation of employees during absences either in the armed forces or on the home front, the effect of such absences on seniority, the granting of leaves of absence, and assurances of reemployment.

The Selective Service Act of September 1940, which established a military training period of 1 year, provided for the reinstatement of other than temporary employees of a company to jobs of like seniority status and pay, if the employee had received an honorable discharge, was still able to discharge his duties, and made application for reinstatement within 40 days, unless the employer's circumstances had so changed as to make it impossible or unreasonable for him to reinstate such an employee. Members of the National Guard and the various reserve corps called for active service were protected by similar provisions under the terms of a Joint Resolution approved by the President in August 1940. The August 1941 amendment to the act extended the period of military training up to a maximum of 18 months and provided that any one who had entered active military or naval service after May 1, 1940, should be entitled to all the reemployment benefits of the act. A second amendment passed after the declaration of war on December 7, 1941, extended the period of military service of men between the ages of 20 and 45 indefinitely, but made no change in the job-protection provisions of the act. The amendment also liberalized the National Service Life Insurance Act so that men who were formerly required to make application for insurance within 120 days after induction could apply for insurance at any time if they submitted satisfactory evidence of good health with their applications for insurance. This was of especial value to men already in the service who had previously been included in their company's group-insurance plan and who became in danger of losing their insurance protection when war was declared.

¹ Company Policies Regarding Military and Civilian War Service. New York, National Industrial Conference Board, 1942. (Studies in Personnel Policy, No. 44.)

Wartime Military Service Policies

The indefinite extension of military service following the declaration of war necessitated further revision of military-service policies by many companies. There were 232 companies included in the study, of which 173 were engaged in manufacturing various products and 59 were either financial institutions, mercantile establishments, public utilities, or petroleum refineries. Three-fourths of the policies included in the study had been adopted or revised since the declaration of war in December 1941, while the remainder of the companies felt that the policies previously in force were sufficiently broad not to require revision.

Although the companies' earlier military-service policies applied in general only to drafted persons and to members of the National Guard and others called into military service under the Joint Resolution of August 1940, three-fourths of the plans covered in the present study apply to employees who enlist for the duration and over half to employees who join one of the services for the regular term of enlistment. Leave of absence for the United States Maritime Service is also granted under 16 percent of the plans.

Temporary employees were excluded from the job-protection provisions of the Selective Service Act, but half of the policies studied include all employees without regard to their length of service. Twelve percent of the remaining half of the policies limit the job-protection privileges to permanent or regular employees, 3 percent to employees with a service record of not less than 3 months, 15 percent to 6 months' service, and 17 percent to 1 year's service, while only 4 companies definitely excluded employees hired after a specified date.

There are certain restrictions on the leaves of absence granted to men who enlist for definite periods, as it may be impossible to hold positions for such employees if the war should end before the termination of enlistment. In several cases it is specified that the leave of absence granted will be for the duration of the war plus 6 months and the 40 days thereafter, while other companies having such a provision will consider on their merits cases in which employees are unable to return to work within the specified postwar period.

Continuous-service credit for the duration of the military leave is granted under nine-tenths of the military-service policies studied. In the other cases seniority is retained as of the date on which the employee left the company's service, but in such cases the employee's service is considered interrupted but not broken.

The Selective Service Act specifies that vacancies created by induction of employees into the armed services may not be filled by a person who is a member of the Communist Party or the German-American Bund. A number of companies include this provision.

Military and Vacation Allowances

Many companies give extra compensation to employees inducted into the military services, in order to help them meet the transition from civilian to Army life. These payments are variously called military-service allowances, military-severance pay, military bonuses, or supplemental benefits. Also, it is a general practice for companies with paid-vacation plans to give inducted employees any vacation pay due them.

Of 187 companies furnishing complete information on all types of allowances paid their employees, 58 gave vacation pay only, 42 military allowance only, 58 both vacation and military allowance, 4 either military allowance or vacation pay but not both, and 25 did not make either type of payment.

Military allowances were being given more frequently in 1942 than in 1940—55.8 percent of the companies surveyed as compared with 36 percent in the first survey. In both years there was a wide variety in these extra-compensation plans, although the practice of providing an allowance equivalent to the difference between company and Army pay was less prevalent in 1942, chiefly because of the difficulties in computing the amount. Of 133 companies paying extra compensation to inducted employees in March 1942, 99 gave a uniform amount ranging from full pay for 1 week up to full pay for 3 months, or in some cases the difference between company and Army pay. Thirteen of these companies paid a portion of the payments over extended periods. In 28 instances the payments were graduated on the basis of length of service. There was a decided trend toward this type of payment as compared with the data for 1940. Another apparent trend shown by the present survey was the reduction in the size of bonus payments. In the first study, two-fifths of the plans provided for an allowance of all or part of the employee's regular income for 3 months and nearly a quarter paid extra compensation for 1 year, whereas in 1942, approximately 70 percent of the plans granted a bonus equivalent to 2 months' pay or less and only a tenth paid an allowance for extended periods. Thus, the two most important trends noted in the study are the increase in the number of companies granting military service bonuses to employees and the decrease in the size of the individual payment.

Satisfactory evidence that an employee has actually been inducted into the Army is required by a number of firms before the extra compensation is paid. This requirement resulted from the fact that many men have passed the preliminary physical examination only to be rejected by the Army doctors upon arrival at camp, and in a number of instances workers have pretended that they were drafted and upon receipt of the military allowance have sought another job.

Insurance and Pension Provisions

Company policy regarding group-insurance coverage for men in service changed radically after the declaration of war. Prior to December 7, 1941, most companies providing group insurance for their employees carried the insurance for inducted men for at least 1 year and paid the entire premium. After that date, however, most of the insurance companies either canceled the group life insurance or raised the rates to very high levels for men who were serving in the armed services. This action forced most firms to discontinue this service for inducted men. Only 10 of 139 companies which had previously provided this protection to inducted employees were continuing this insurance at the time the study was made. However, in order to give employees time to apply for the Government insurance, about one-third of the 139 companies continue it for short periods ranging from 2 to 4 months.

National Service Life Insurance, provided by act of Congress, is sold in units of \$500 with a minimum coverage of \$1,000 and a maximum

of \$10,000. Among the 139 companies which had formerly provided free group life insurance for their employees after induction, 56 (or 40 percent), are now either paying premiums for insurance equal to the employee's coverage under group insurance or are buying uniform amounts of insurance ranging from \$1,000 to \$5,000. Twenty of these companies were paying the premiums on these policies.

Military service usually does not interrupt the service record in non-contributory pension plans, but under the contributory plans, of which there were 32, all contributions were suspended in 17 cases during the military leave, the employee being allowed to withdraw his contributions although this terminated his membership in the plan. In six cases the employee is allowed to continue his contributions; three firms will contribute if the employee pays his share; and six companies are paying the entire costs.

In three cases in which disability benefits were paid in connection with the pension plan, these benefits are extended to employees disabled in military service in the case of those who have fulfilled the length-of-service requirements.

Policies for Other Services

Information was secured regarding the policies of 196 companies relating to service of their employees in State or Home Guards, which were organized in many States following the mobilization of the National Guard for active service in 1940. Fifty-eight of the companies reported that employees are given some compensation during their absence on Guard duty. Under present conditions, absences for this purpose are likely to be fairly short and 11 companies provide for payment of allowances throughout the period of absence. A majority of the companies fix a maximum number of weeks or months which will be compensated in the year, ranging from 1 week to 3 months. The State Guard payments are on an annual basis and the allowances, therefore, are payable for more than the 1 year in all but a few cases. Eligibility for compensation is open to all employees in nearly two-thirds of the companies; in the others relatively short service periods are required.

The problem of organizing and training air-raid wardens, plane spotters, and fire fighters for the purpose of protecting the plant from fire or other damage caused by air raids has arisen in recent months. As the possibility of attack seems somewhat remote in some areas, more than half of the 196 firms either reported that no plans for air-raid protection had been made or did not answer the question.

Company policies regarding payment of employees engaged in such services will necessarily be affected by the opinions of the Wage and Hour Division of the United States Department of Labor regarding the application of the Fair Labor Standards Act which were issued on April 27, 1942.

The rulings covering work as volunteer watchmen, time spent during blackouts and air-raid alarms, and training for air-raid protection provide in general that compensation must be paid for time spent in such activities during working hours when done for the employer or if additional hours at the plant are required, while generally no compensation is payable under the terms of the act for volunteer work of this nature for Federal, State, or local governmental defense agencies, even though

such activities are carried on at the plant, or for voluntary participation in air-raid protection programs after regular working hours.

The data on company policies regarding payment for volunteer air-raid protection services were secured prior to the issuance of the Wage and Hour Division's opinions. At that time 86 companies had decided on a definite procedure. Seventy-one companies were compensating employees for time lost through practice air-raid drills, and 66 intended to pay for such losses in the event of actual air raids.



LEGAL RESTRICTIONS ON EMPLOYMENT OF ALIENS IN PARAGUAY, 1942¹

NINETY percent of the wage earners and 95 percent of the salaried employees in Paraguay employed by companies, industrial establishments, commercial enterprises, and banks must be of Paraguayan nationality, according to decree law No. 13,294 of June 26, 1942, which was to become effective 2 months from date of publication. After this legislation has been in force for 2 years, it is to become applicable to aliens engaged in legitimate activities in Paraguay, "without political prejudices," who have resided in Paraguay at least 10 years. The percentage requirements are not applicable to employers having 4 or fewer employees. Paraguayans and aliens performing the same work are to be paid on an equal basis.

In computing percentages of national and alien personnel, the entire number of employees under the same establishment throughout Paraguay shall be taken as the basis. All specialized technical personnel who, in the judgment of the National Labor Bureau, cannot be replaced by Paraguayan citizens of the same capacity are exempted from the percentage requirement. Aliens having Paraguayan wives, or widows or widowers of Paraguayans having Paraguayan children, shall be considered Paraguayan citizens. The preferred standing of Paraguayan nationals, when other conditions are equal, shall be established in each labor contract. Competitive positions requiring employment of a person holding a degree shall be filled exclusively by persons holding degrees obtained in Paraguay or by Paraguayan citizens holding similar degrees obtained outside of Paraguay. In case dismissal of employees is necessary, aliens shall be the first to be dismissed. Positions relinquished by persons entering military service are to be held open for their return after such service is terminated. Theatrical employees and other public entertainers who do not remain in Paraguay longer than 3 months are exempt from this legislation.

Every employer to whom this legislation applies must submit to the National Labor Bureau a complete list of his employees, with pertinent citizenship information concerning each. Labor contracts concluded in Paraguay between a Paraguayan citizen and an employer outside the country must be approved by the National Labor Bureau and legalized by the consul of the country in which the work is to be performed; in such contracts it must be specified that the expense of repatriation of the worker shall be paid by the employer.

The regulations for this legislation shall determine the services to be considered technical.

Fines are prescribed for violations of this legislation.

¹ Data are from report of Wesley Frost, United States Ambassador to Paraguay.

Social Security

UNEMPLOYMENT-COMPENSATION OPERATIONS, FIRST HALF OF 1942 ¹

MORE than \$222,000,000 was paid out in benefits for unemployment during the 6 months ending June 30, 1942, and approximately 2 million persons received at least one benefit payment during the period, or a weekly average of over 710,000 persons. Altogether, compensation was paid for more than 18,000,000 weeks.

As in the previous 2 years, initial-claims receipts (marking the initiation of new periods of unemployment), after rising sharply in January 1942 when war displacements were at a peak, declined markedly in February, and this decline continued through March. They rose again in April, declined abruptly in May, and rose again in June, to a point which, although higher than in February, March, and May, was nevertheless 35 percent below the January level. The defense program has helped to wipe out much of the seasonal unemployment. On the other hand, loss of jobs because of operation of priorities and temporary displacements due to the conversion of plants to war production have served to swell the ranks of the unemployed. This is evident in the increased initial-claims receipts in some of the important industrial States.

Waiting-period claims declined more sharply than compensable claims (45.1 as compared with 26.7 percent), suggesting that while the incidence of unemployment was less than last year the duration was greater.

Benefit payments, which showed an up-and-down movement during the first 4 months of the period, had a steady decline from April through June. While June benefits were slightly below the level of the corresponding month of 1941, disbursements for the entire 6-month period were substantially above the total for the first half of last year. This reflected the presence of heavy conversion unemployment in the early part of the year.

Weeks for which compensation was paid, after a rise from February to March, fell steadily thereafter each month through June when the number reached the lowest point in the 6-month period. However, the number of weeks for which benefits were paid for total unemployment in June constituted nearly 92 percent of the total weeks, as compared with 90 percent in January and 89 percent in December.

A summary of the operations of the unemployment-compensation system during the 6-month period ending in June 1942 is given in the accompanying table.

¹ Based on data supplied by Reports and Analysis Division, Bureau of Employment Security, Social Security Board.

Summary of Unemployment-Compensation Operations, First 6 Months of 1942

Item	6-month period	January	February	March	April	May	June
Initial claims (local office).....	¹ 4,300,043	¹ 1,962,082	620,270	592,845	751,793	582,576	690,477
Continued claims.....	22,303,871	4,584,016	4,103,347	3,977,564	3,512,469	2,970,060	3,156,415
Waiting-period.....	3,863,354	1,095,442	686,934	506,181	566,658	407,259	600,880
Compensable.....	18,440,517	3,488,574	3,416,413	3,471,383	2,945,811	2,562,801	2,555,535
Weeks compensated.....	18,270,464	3,553,498	3,351,440	3,457,021	2,909,578	2,568,595	2,430,332
Total unemployment.....	16,779,312	3,205,237	3,095,838	3,202,146	2,687,515	2,363,167	2,225,409
Part-total unemployment.....	795,841	² 348,261	³ 91,261	³ 104,093	⁴ 91,534	⁵ 86,706	⁵ 73,986
Partial unemployment.....	683,207	(*)	162,153	148,755	128,635	116,011	127,653
Gross benefits paid.....	\$222,215,651	\$41,055,955	\$39,883,617	\$43,034,821	\$36,310,630	\$31,704,306	\$30,226,322
Number of benefit recipients:							
Estimated individuals during month.....		1,223,400	1,209,700	1,072,800	979,000	844,800	876,800
Weekly average for month.....	710,180	796,598	837,650	803,124	668,262	609,734	552,735

¹ Not including Alaska for which reports were not received.² Includes partial unemployment.³ Not including Rhode Island and South Dakota for which reports were not received.⁴ Not including South Dakota for which report was not received.⁵ Not including Rhode Island for which report was not received.

(*) Included with part-total employment.



CHANGES IN FRENCH SOCIAL-INSURANCE SYSTEM

UNDER the original French social-insurance law, which was put into effect July 1, 1930, workers in industry and commerce were divided into five wage classes, and the maximum wage (including allowances for dependent children) for inclusion in the system was fixed at 25,000 francs. A decree law of October 1935 abolished the wage classes, and the wage limit of those compulsorily insured was raised in 1936. In 1938 this limit was fixed at 30,000 francs a year, without regard to the number of dependents, cash sickness benefits were increased, and regulations governing the payment of various benefits were relaxed.

Two laws of January 6, 1942, made considerable changes in the existing system for persons employed in industry and commerce.¹ By these amendments the liability to insurance was extended by raising and in some cases abolishing the wage limit, and the operation of the scheme was simplified by revising the regulations governing the granting and calculation of sickness and maternity benefits and survivors' benefits, and by changing methods of collecting contributions and accounting.

The wage limit for inclusion in the system has been abolished for manual workers in general and for other persons whose earnings depend on the number of hours or days worked or on output. Thus, workers paid on an hourly, daily, weekly, or piece-rate basis or by the job are liable to insurance without regard to the amount of their pay or earnings. In addition to practically all manual workers, this group includes persons whose remuneration is dependent upon uncertain factors—such as home workers, commercial travelers, hotel and restaurant employees, taxi and other drivers who do not own the

¹ International Labor Review (Montreal), July 1942.

vehicle, baggage porters, and theater attendants. Workers paid on a monthly or fortnightly basis or on a commission or turn-over basis are liable to insurance if their annual pay or earnings, excluding family allowances, do not exceed 42,000 francs a year, reckoned on the basis of an estimated 2,000 statutory working hours per year. The distinction between the two groups is based on the fact that if there is a wage limit, whatever its amount, it is often difficult to determine whether workers paid by the hour, day, or week, or by the amount of work done, are liable to insurance, since it is impossible to determine their earnings in advance, particularly when wages are tending to change. The increase in the wage limit to 42,000 francs for other workers was for the purpose of taking into account both the rise in wages and the need for extending the insurance protection to persons who had not been covered.

Benefits

Under the system formerly in effect the payment of benefits depended either on a qualifying period or on the payment of a minimum number of contributions. These qualifications are now not required, and insured persons and members of their families are entitled to sickness benefits on the sole condition that during the 3 months preceding the issue of the first medical certificate attesting a sickness or accident of nonoccupational origin the insured person has been in paid employment or a similar occupation or has been registered with an employment office. In other words, an insured person may claim cash benefits and medical assistance for himself and his family without proving that he has previously been insured or paid a stated number of contributions. Under the terms of the 1935 decree, an insured person could not claim sickness benefits unless 30 francs had been deducted from his wages in the 2 quarterly periods preceding that in which the sickness or accident occurred, or unless 60 francs had been so deducted during the 4 preceding quarterly periods.

These amendments apply to persons covered by the general social-insurance scheme, with the exception of domestic servants, home workers, casual workers, persons employed by the piece or job, those paid on commission or according to turn-over, and persons working for several employers. Agricultural and forestry workers are also excluded.

Similar provisions apply in the case of maternity insurance, but an applicant for benefit must show membership in the system for more than 10 months preceding the confinement, and the first medical certificate of pregnancy must be notified to the fund at least 3 months before the expected date of confinement.

The payment of benefits under the survivors' insurance scheme, which was formerly dependent upon 1 year's membership and the payment of not less than 60 francs in the 4 quarters immediately preceding death (if sudden death) or the sickness or accident causing death, are now dependent only upon the insured person's having been engaged in paid employment or a similar occupation, or having been registered with an employment office, during the 3 months preceding the death or the sickness or accident causing death.

Contributions

Simplified methods of collecting and crediting contributions have been introduced by the new legislation. Employers of fewer than 50 persons are required to make a general return in the prescribed form, during the first 10 days of each quarter, while employers of 50 persons or more are required to make such a return within the first 10 days of each month. The report in each case shows the gross wages paid to the persons covered by the insurance and the total amount of contributions, but does not specify for each individual the amount of his wages or his contribution.

Within the same time limits, the employer must pay the entire amount of the contribution into a post-office current account which is opened by each regional social-insurance service. Penalties are provided for failure to make the payments within the prescribed time limits. An annual report is required from each employer before February 1, showing the total gross wages paid and the total amount of the employers' and workers' contributions for each insured person during the preceding year.

All the sums paid into accounts of the regional social-insurance services are transferred to a special account in the Deposit and Trust Fund.

A monthly report of the benefits paid for sickness, maternity, and survivors' insurance during the preceding month must be made by each social-insurance fund which receives the corresponding accounts from the Deposit and Trust Fund.

Although the returns and statements submitted by employers give the gross wages, the social-insurance contributions are calculated on the net remuneration, account being taken, where necessary, of payments in kind and tips, and a deduction being made of working expenses and workshop expenses; family allowances are not taken into account. The new regulations regarding reports represent a considerable diminution of the employer's responsibility with regard to wage declarations, since a detailed report for individual workers is required only once a year.

Employment Offices

PLACEMENT WORK OF UNITED STATES EMPLOYMENT SERVICE, FIRST HALF OF 1942¹

DURING the first 6 months of 1942 the United States Employment Service effected 3,688,383 placements, of which about one-sixth were in agricultural jobs and the remainder were in nonagricultural jobs. Agricultural placements fell from 32,039 in January to 23,151 in February, but thereafter rose successively each month to a peak of 280,428 in June. The same general trend occurred in nonagricultural placements, but at a considerably slower rate, rising from 402,235 in February to 643,660 in June.

The 182,000 farm-work placements in May were more than 3½ times as numerous as in April—a considerably sharper increase than for the same period in either of the previous 2 years. About half of this increase was accounted for by the 900-percent rise in agricultural placements in Arkansas, mainly on fruit and nut farms. Except for the harvest peak months of September and October of 1940 and 1941, the 280,000 placements in June represented the highest monthly total on record since comparable data first became available in January 1940.

The 643,660 nonagricultural placements in June—7.1 percent above the May level—represented the highest monthly total since 1935, when large numbers of placements of relief recipients served to swell the totals. Nonagricultural placements in May 1942 were almost one-fourth more numerous than in May 1941 and four-fifths above the May 1940 level. Most of the May-June 1942 gain occurred in the less industrialized areas of the country; a majority of the leading industrial States registered declines or less-than-average increases.

Job applications, new and renewed, which numbered 1,956,371 in January, fell by more than 400,000 in the next month, but rose gradually through April, fell off slightly in May, and took a sharp rise to 1,840,854 in June, when a large number of students registered with public employment offices. During the 6-month period, over 10,000,000 applications were handled by the Service.

The active file fell steadily throughout the first 5 months, from 4,895,125 to 4,252,457, but rose in June to 4,279,825. The number of job seekers registered with public employment offices in May was, except for October and November 1941, the smallest in the history of the Employment Service. The number of women in the active file increased for the second successive month, but the number of men sank to the lowest level on record. The influx of women formerly not in the labor market accounts in part for the relatively smaller drop in woman registrants.

¹ Based on data supplied by Reports and Analysis Division, Bureau of Employment Security, Social Security Board.

A summary of the 6 months' operations is shown in the following table.

Summary of Placement Activities, first half of 1942

Month	Placements			Applica- tions, new and renewed	Active file, end of month
	Total	Agricul- tural	Nonagri- cultural		
6-month period.....	3,688,383	603,457	3,080,524	10,038,275	
January.....	438,604	¹ 32,039	¹ 405,878	1,956,371	4,895,125
February.....	² 426,009	³ 23,151	³ 402,235	1,531,757	4,888,000
March.....	510,198	¹ 35,637	¹ 474,701	1,572,193	4,559,139
April.....	² 605,350	³ 50,650	³ 553,972	³ 1,573,908	² 4,393,510
May.....	² 782,460	³ 181,552	³ 600,078	² 1,563,192	² 4,252,457
June.....	924,962	¹ 280,428	¹ 643,600	1,840,854	4,279,825

¹ Excluding Alaska for which no report was received.

² Excluding Hawaii for which no report was received.

³ Excluding Alaska and Hawaii for which no reports were received.



Industrial Relations

DECISIONS OF NATIONAL WAR LABOR BOARD, MAY-JULY 1942

SINCE its creation in January 1942, the National War Labor Board has issued 54 directive orders finally determining disputes between employers and unions which threatened to interrupt war production.¹ During the period May 1 to July 31, 1942, governmental policy toward wage issues and union security became more clearly defined through a series of significant decisions, including the so-called "Little Steel" decision of July 16.

In the wage award for these four steel companies the Board announced a set of guiding principles which should be applied in evaluating wage increases. The basic principle of this wage program is the maintenance of the purchasing power of hourly wage rates as of January 1, 1941, with "due consideration to inequalities and substandards of living." Since the cost of living increased by about 15 percent between January 1, 1941, and May 1942, "if any group of workers averaged less than a 15-percent increase in hourly wage rates * * * their established peacetime standards have been broken * * * [and they] are entitled to have these standards re-established as a stabilization factor."

Wage Disputes

On April 27, 1942, President Roosevelt announced a seven-point program designed to stabilize the cost of living and prevent inflation. That part of the President's message discussing wage stabilization is:

In respect to the third item, seeking to stabilize remuneration for work, legislation is not required under present circumstances. I believe that stabilizing the cost of living will mean that wages in general can and should be kept at existing scales.

Organized labor has voluntarily given up its right to strike during the war. Therefore all stabilization or adjustment of wages will be settled by the War Labor Board machinery which has been generally accepted by industry and labor for the settlement of all disputes.

All strikes are at a minimum. Existing contracts between employers and employees must, in all fairness, be carried out to the expiration date of those contracts. The existing machinery for labor disputes will, of course, continue to give due consideration to inequalities and the elimination of substandards of living. I repeat that all of these processes now in existence will work equitably for the overwhelming proportion of all our workers if we can keep the cost of living down and stabilize their remuneration.

Most workers in munition industries are working far more than 40 hours a week and should continue to be paid at time and a half for overtime. Otherwise, their weekly pay envelopes would be reduced.

All these policies will guide all Government Agencies.

¹ For an analysis of significant decisions issued prior to May 1, 1942, see *Monthly Labor Review*, June 1942 (p. 1344). In addition to these directive orders, the Board settled approximately 75 cases through mediation and arbitration.

Through this pronouncement the National War Labor Board was given an important role in the stabilization program, and in wage determinations since April 27th the Board has adapted its decisions to the policies set forth by the President.

BREEZE CORPORATIONS CASE

In the case of the Breeze Corporations, Inc., a request of the International Union, United Automobile, Aircraft and Agricultural Implement Workers of America (C. I. O.) for a general wage increase of 15 cents per hour was denied by the Board. Instead, the Board, in a unanimous decision issued May 22, 1942, set wage standards for 10 classifications of work, which had the effect of raising wage rates for some types of work and lowering rates for others. Under the Board order the pay of employees receiving more than standard rates was not to be reduced, but they were to be reclassified or reassigned so that their rate would become appropriate for the job performed.

CHASE BRASS & COPPER CASE

The International Association of Machinists (A. F. of L.) requested a flat increase of 10 cents an hour for employees of the Chase Brass & Copper Co. mill at Cleveland. The Board, by a vote of 8 to 4 (the labor members dissenting) on May 28 denied the request and ordered an upward wage adjustment of 4 cents an hour and an additional amount, averaging not less than 2 cents an hour nor more than 3 cents an hour, for leveling out inequalities within occupational groups.

In support of its decision, the Board pointed to wages paid for comparable work in the Cleveland area and wages paid in the company's plants in Waterbury, Conn. The majority opinion stated:

The War Labor Board has the definite responsibility for settling wage cases which come before it in line with the wage-stabilization program as outlined by the President when he wrote "that wages in general can and should be kept at existing scales." Such stabilization is to be carried out, of course, with due regard to adjustments necessary to eliminate inequalities and substandard conditions. The adjustment which is made in this case recognizes existing scales and adjusts the Chase rates to them with the objective of attaining the contemplated stabilization. The majority of the Board has voted for that increase in wages which will stabilize wage scales within the Cleveland plant and also in relation to comparable plants in the Cleveland area and with other plants in the brass industry.

ARMOUR LEATHER CO. CASE

The International Fur and Leather Workers (C. I. O.) requested wage increases in four Pennsylvania plants of the Armour Leather Co. The Board by unanimous vote granted increases of 4 cents an hour in one plant and 3 cents an hour in two others, but allowed none in the fourth plant. Only 500 of the 1,400 men involved in the dispute received increases. In its decision, issued June 10, the Board adopted as its own the recommendations of a 3-man panel, which stated:

It is the belief of the panel that the wages at these three plants are substandard both in the sense of being below industry and Eastern standards and in failing to provide a decent living standard. An equitable adjustment, such as is recommended, is believed to be entirely consistent with the President's wage policy.

MEAD CORPORATION CASE

The Board on June 10, 1942, unanimously ordered wages of all employees at the Lynchburg, Va., plant of the Mead Corporation increased by 7 cents an hour, retroactive to January 4. The dispute arose between the company and the United Mine Workers, District 50 (C. I. O.).

In an opinion accompanying the directive order, it was pointed out that on the basis of figures submitted by the company—

(1) Hourly rates at the Lynchburg plant are generally low, since starting rates are \$0.46 per hour and average earnings, including overtime, are only \$0.64 per hour for all employees. (2) The wage rates at the Heald division are below the average of the rates paid by concerns making similar products in Virginia. (3) Wage rates at this plant are substantially below the average wage rates of employees in the paperboard industry as a whole.

RANGER AIRCRAFT ENGINES CASE

The United Automobile, Aircraft and Agricultural Implement Workers (C. I. O.), representing employees of the Farmingdale, Long Island, plant requested a general wage increase of 15 cents an hour. The Board unanimously granted an upward adjustment of 10 cents an hour to stabilize the earnings of the company's employees and bring them more nearly to the level of wages paid in comparable plants and on comparable jobs. In its decision of June 12 the Board said:

It needs to be emphasized that there is no rule of thumb or static wage formula that can be applied mechanically in wage cases to the end of producing wage stabilization. Hence, it is not surprising that the President's message on wage stabilization permits of that degree of flexibility necessary to a fair and just balancing of the various interests which are involved in wage dispute cases. It gives to the War Labor Board that reasonable degree of discretion which is necessary if it is to decide individual cases on their merits and at the same time stabilize wages by checking unwarranted wage demands. Through a wise exercise of the discretionary power granted to it in the President's stabilization program, the Board can do much toward preventing the cost of living from spiraling upward.

OTHER WAGE DECISIONS

Other cases have followed nearly identical reasoning. Thus on June 16 the Board granted a wage increase of 5 cents an hour for boatmen and warehousemen of three Great Lakes shipping companies, taking into consideration comparable wages in the Buffalo area and the low annual earnings of these employees as a result of the casual and seasonal nature of their employment. Also on June 16, a unanimous vote of the Board gave wage increases of 7½ cents and 1-week paid vacations to 10,000 employees of 187 Douglas fir operators in the Puget Sound area. On June 18 another unanimous decision allowed a blanket increase of 10 cents an hour retroactive to October 15, 1941, to employees of the Ryan Aeronautical Co. to bring the company's wage rates into line with the rest of the Southern California aircraft industry.

Ten thousand employees of the Connecticut plants of the American Brass Co. received an 8-cent hourly wage increase by Board action on June 25th. The Board on June 26 adopted a panel recommendation for increases of 50 cents a day to 6,100 employees at the Arizona plants of the Phelps Dodge Corporation. In this case the panel stated

frankly: "Under ordinary circumstances a larger wage increase than the panel is now prepared to recommend might be justified by the facts in this dispute. The panel, however, is fully aware of the acute necessity to view all demands for wage increases in the light of the President's message * * *." On the other hand, on July 3 the Board unanimously decided to bring the wages of seamen employed by the Detroit & Cleveland Navigation Co. up to the level prevailing for other seamen on the Great Lakes, despite the fact that the company has been operating at a loss since 1930.

By a vote of 6 to 3, employer members dissenting, the Board on July 6 issued an order stabilizing wages in nine New England textile plants, covering approximately 5,000 employees. Those employees whose base rates were 64 cents an hour or less received an increase of 7 cents; those whose base rates were 65 cents received an increase of 6 cents; and those with base rates of more than 65 cents received an increase of 5 cents per hour.

The "Little Steel" decision.—Two major wage issues were decided by the Board in the "Little Steel" decision of July 16. The first involved the union's demand for a general wage increase. The second was the issue of minimum daily-wage guaranties for workers paid on an incentive basis.

With regard to daily-wage guaranties, the union contended that incentive workers should be guaranteed for each day of work either the basic minimum wage per hour, or the occupational rate for the hours worked on that date, or their actual earnings based on the tonnage, piecework, or contract rate, whichever is highest. Under the previous company practice of averaging earnings over a pay period, high daily earnings achieved by incentive production might be cancelled if breakdowns or work delays on following days caused earnings to drop below the minimum. The Board unanimously supported this position and ordered the four steel companies to incorporate minimum daily-wage guaranties in their union agreements.

In its decision on the general wage increase, the Board formulated a set of guiding principles which it announced hereafter "should be applied in evaluating claims for wage increases." These principles were based on maintaining the purchasing power of hourly wage rates as of January 1, 1941. Specifically, the Board decision included the following points in its wage program:

(1) For the period from January 1, 1941, to May 1942, which followed a long period of relative stability, the cost of living increased by about 15 percent. If any group of workers averaged less than a 15-percent increase in hourly wage rates during or immediately preceding or following this period, their established peacetime standards have been broken. If any group of workers averaged a 15-percent wage increase or more, their established peacetime standards have been preserved.

(2) Any claim for wage adjustments for the groups whose peacetime standards have been preserved can only be considered in terms of the inequalities or of the substandard conditions specifically referred to in the President's message of April 27, 1942.

(3) Those groups whose peacetime standards have been broken are entitled to have these standards reestablished as a stabilization factor.

(4) The Board, as directed by the President in his April 27 message, will continue to "give due consideration to inequalities and the elimination of substandards of living."

(5) Approximately 20 wage disputes, still pending before the Board, were certified prior to the stabilization date of April 27. The question arises in these cases whether wage rates being paid on April 27, 1942, can or cannot be considered as "existing rates" within the meaning of the President's message, or whether they then had the tentative character of disputed rates. Due regard must be

given to any factors of equity which would be arbitrarily swept away by "a change of rules in the middle of the game."

The guiding principles outlined above insure, in general, that claims for wage rate adjustment can be considered on an equitable basis and in a manner which will further the national purpose to stabilize the cost of living.

On the basis of the above principles the Board granted employees of the Bethlehem Steel Co., the Republic Steel Corporation, the Youngstown Sheet & Tube Co., and the Inland Steel Co. an increase of $5\frac{1}{2}$ cents an hour, or an average of 44 cents a day. (The United Steel Workers of America (C. I. O.) had asked for an increase of $12\frac{1}{2}$ cents an hour, or \$1 a day, for the 157,000 workers involved.) The increase was retroactive to February when the cases were certified to the Board. The vote on the wage issue was 8 to 4, the labor members dissenting.

In its decision, the Board explained how the $5\frac{1}{2}$ -cent increase was determined:

The steel workers had secured a wage increase of 11.8 percent between January 1, 1941, and May 1, 1942; as compared with a 15-percent increase in the cost-of-living index during this period. Thus, they had suffered a loss of 3.2 percent in their peacetime standards. Therefore, they were entitled to an hourly increase of 3.2 cents in order to reestablish their peacetime standards, since the average hourly wage rate in the steel industry is \$1.

Since the dispute was certified to the Board more than two and one-half months prior to the President's message to Congress of April 27, outlining the National Economic Policy, the steel workers were caught by a "change of the rules in the middle of the game." In view of this factor and the greater cost-of-living change in steel towns as compared with the national average, the Board decided that the workers in this case had an additional equity which entitled them to a further increase of 2.3 cents an hour.

In their dissent, the four labor members of the Board referred to the unanimous report of the Board's tripartite fact-finding panel, which found that since April 1941, the date of the last general wage increase in the steel industry, the buying power of steel workers had decreased approximately 13.3 percent. To restore purchasing power to the level of April 1941, rather than January 1941, would, according to the labor members of the Board, justify the wage increase of \$1 a day asked by the union. The panel also found that "all four companies are able to pay the requested wage increase of \$1 a day." With regard to the inflationary effect of the wage increase, the dissenting opinion stated:

The labor members of the Board presented a motion that the entire wage adjustment of \$1 per day requested by the union be awarded in the form of war bonds. This was voted down. The labor members then presented a motion that 56 cents be paid in war bonds and 44 cents in cash. This also was voted down. * * * The majority insists that a wage adjustment of \$1 per day in cash would be dangerously inflationary and must therefore be refused. But inasmuch as the majority does not, and cannot, contend that granting the wage adjustment of \$1 per day in the form of war bonds would be inflationary, its whole argument collapses.

REMINGTON RAND CASE

In applying its wage-stabilization formula to the first case after the "Little Steel" decision, the Board, with the labor members dissenting, on July 27 refused a general wage increase to 1,200 employees of the Tonawanda plants of the Remington Rand Co., although an increase of $2\frac{1}{2}$ cents an hour was granted to women employed at incentive rates. The United Electrical, Radio and Machine Workers (C. I. O.) which represented the employees, had asked for a flat increase of 10 cents an hour.

The Board found that the employees had received two wage increases since January 1, 1941, totaling 18 cents an hour for men and 11 cents for women. Since these increases exceeded the 15-percent rise in the cost of living between January 1941 and May 1942, the Board concluded that the employees were not entitled to a further wage increase in view of the wage-stabilization formula laid down in the "Little Steel" decision. Referring to the comment and publicity which had been given the "Little Steel" wage formula, the Board stated:

The decision of the War Labor Board in this case demonstrates the applicability and workability of the wage-stabilization formula which it has adopted. It will not follow, as publicized in the press, that an application of the formula will result in a huge increase in the nation's wage bill, totaling three or more billion dollars. The National Association of Manufacturers has called attention to the fact that over two-thirds of the manufacturing industries of the country have already made increases equal to or in excess of the level fixed by the War Labor Board's formula. The other one-third have made increases averaging close to the 15 percent called for under the formula. Hence, the application of the Board's formula will result in only minor increases in the Nation's wage levels. Such wage increases as will be allowed by the formula will be so insignificant in contrast with the total wage bill of the country as to have no inflationary effect.

Disputes Involving Union Security

During the period May 1 to July 31, 1942, the War Labor Board continued to grant "maintenance of membership" clauses in many cases. The votes in most of these decisions were divided, with the employer members dissenting. In a few decisions the Board refused to grant the union's demand for "maintenance of membership" clauses. Union-security clauses stronger than mere "maintenance of membership" were granted in two cases. A voluntary check-off of union dues was ordered in the "Little Steel" case and a few others.

The reasons advanced by the Board majority in ordering "maintenance of membership" clauses centered in the need for strong, stable unionism in war plants, to insure maximum output and a minimum of internal disturbance and friction. Recognizing that unions, during the war period, will not be able to secure for their members all the gains, particularly wage increases, which they might have secured through normal collective bargaining, the Board has sought to insure the "status quo" of union strength in order that all the normal collective-bargaining activities may be resumed when the war ends.

A new type of "maintenance of membership" clause, allowing a 15-day "escape" period during which union members may resign if they desire, was introduced by the Board. This was done in an attempt to meet the objections of employer members of the Board, who had consistently voted against membership-maintenance clauses. Two of the four employer members voted in a few cases for such a clause, and in one case (Phelps-Dodge) a unanimous vote was secured. However, in later cases, the employer members again voted solidly against union-security provisions, even with the "escape" clause. In doing so they proposed that in addition to the "escape" clause all unions which are granted union security by the War Labor Board should be required to file financial statements and other records with the Board; the other members of the Board refused to accept this suggestion. In a case decided August 1, 1942 (S. A. Woods Machine

Co.) two employer members of the Board again voted for membership maintenance. In so doing they stated their general position on the question:

When it came to a vote on this case, in which the three members of the mediation panel had unanimously recommended a maintenance-of-membership clause, the employer Board members were faced with a choice of two alternatives. One was to continue to vote against granting maintenance of membership except in such cases where circumstances very clearly justified it as a means of securing uninterrupted war production. The other was to assent on the grounds that nothing constructive could be gained by continually voting no as a matter of principle.

The latter course was chosen in the belief that constant emphasis on disagreement could serve no useful purpose in this critical period.

However, the employer members wish to make plain that they reserve their rights to reverse or revise their position on the question of maintenance of membership at any time and in any case coming before the Board, particularly when they think because of some special facts the public interest would not be served by granting maintenance of membership.

ARMSTRONG TOOL CASE

The United Automobile Workers of America (A. F. of L.), in negotiating its first agreement with the Armstrong Brothers Tool Co., met with a flat refusal of its demands for some form of union security. Instead, the company issued a "statement of policy" to all its employees which outlined the company's position and stated: "We hold that any man can work for the Armstrong Brothers Tool Co. whether he belongs to a union or not." After a brief strike, the case was referred to the War Labor Board. The Board found that the company's "attitude has been such as to encourage nonunion employees to resist further organizational and bargaining efforts of the union." The company, however, agreed orally to administer "appropriate discipline" to employees who engage in antiunion activities. The union asked the Board for a "union shop" or at least a "maintenance of membership" clause to protect its bargaining status.

The Board decided unanimously not to grant the union security asked for by the union, on the grounds that "* * * despite the company's attitude, the union now claims 426 out of 500 employees as members. Furthermore, this is the first contract between the parties, and their relationship is less than a year old." Instead, the Board ordered that the following "harmony" clauses be inserted in the union agreements:

The company will not permit any employee or group of employees to engage in activities on company premises tending to undermine the union, its membership or its collective bargaining status, and will administer appropriate discipline to any employee engaging in such activities. If such activities nevertheless continue, the company and the union will * * * discuss further methods of procedure.

The union agrees that neither the union nor its members will intimidate or coerce employees into joining the union, and further agrees that during working hours it will not solicit membership or conduct any union activities other than those of collective bargaining and handling of grievances in the manner and to the extent provided in the collective agreement between the parties.

UNITED STATES LINES CO. CASE

The union-security aspects of this case involved the demand of the union, a local of the Masters, Mates and Pilots of America (A. F. of L.) representing the United States Lines Co.'s licensed deck officers, for a strong preferential-hiring clause in its agreement with the com-

pany. The clause proposed by the union required the company to give employment preference to qualified union members and allowed the employer to choose his personnel provided the men chosen were union members. The company agreed to give preference to qualified union members when available "when vacancies occur necessitating the employment of licensed deck officers outside the company's employees at such time." In essence, the company wanted the right to promote employees to licensed deck jobs regardless of their union membership. The union objected that this would permit the company to circumvent the preferential-hiring clause by hiring licensed men as seamen or quartermasters and shortly thereafter promoting them to deck officers' positions. In its directive order, unanimously adopted and issued May 16, the Board stated:

The parties should take cognizance of the intent of the panel, and of the Board, to provide the company with the choice of hiring procedures under the union-security clause which reads:

"In filling vacancies for licensed deck officers the company shall give preference to members of the national organization of Masters, Mates & Pilots of America over nonmembers, including nonmembers already in the employ of the company in some other capacity if members are available and are qualified for the post. The company shall inquire of the organization whether members are available as soon as practical after a vacancy occurs and shall give the organization a reasonable opportunity to supply them; provided, however, that the company shall have the right to pick licensed deck officers without such inquiry if they are or become members of the organization upon employment."

In applying this clause, either of two procedures may be followed: (a) The company may make its own selection of men to fill vacancies for licensed deck officers, even though those selected are not union members, as long as they become members of the union upon their employment. This particular procedure may apply either as respects the hiring of deck officers "from the outside" or as respects the promotion of seamen in the employ of the company. (b) The company may employ licensed deck officers under the preference requirements of the clause. This requires the giving of preference to qualified union members. If such qualified officers cannot be provided by the union from its members, however, the company may then employ deck officers who are not members of the union and who are not obligated to become members of the union.

BROWNE & SHARPE MANUFACTURING CO. CASE

In a divided opinion, with employer members of the Board dissenting, a maintenance-of-membership clause was ordered included in this company's agreement with the International Association of Machinists (A. F. of L.) which, however, allowed any union member who did not wish to continue his membership to withdraw between the date of the Board's order and the signing of the agreement. The clause reads as follows:

All members who at the date of the signing of this contract are members of the union in good standing, in accordance with the constitution and bylaws of the union, and those employees who may hereafter become members shall, as a condition of employment, remain members of the union in good standing during the life of the agreement.

Immediately after the signing of the agreement, the union shall furnish to the National War Labor Board a notarized list of members in good standing as of that date. If any employee named on that list asserts that he has withdrawn from membership in the union, the assertion or dispute shall be adjudicated by an arbiter appointed by the National War Labor Board whose decision shall be final and binding upon the Union and the employee.

This was the first agreement between the company and the Union, and the Board gave the following reasons for its action:

The fear of the union that its surrender of the strike weapon for the duration of the war has placed it in a vulnerable position vis-a-vis the company has con-

siderable justification in the light of the history of employer-employee relations in Browne & Sharpe. The protracted negotiation over a contract has raised in the employees' minds the suspicion that the company is "going through the motions" with no real intention of reaching an agreement. That such a suspicion may be entirely unjustified is aside from the point in considering the relation of this company to the nation's war needs. The refusal of the president of the company (in whose hands decisions on the nature of any agreement the company would be willing to sign apparently rests) to meet with the union or to participate in the negotiations before the mediation panel lends credence to the misgivings of the union with respect to the willingness of the company to cooperate with it.

ROBINS DRY DOCK & REPAIR CO. CASE

This case was brought to the Board by the Industrial Union of Marine and Shipbuilding Workers (C. I. O.). In contrast to the Browne & Sharpe decision, the maintenance-of-membership clause ordered by the Board, employer members dissenting, offered no "escape" period during which union members might withdraw from membership. The clause requiring all present members of the union to retain their membership in good standing as a condition of employment was merely inserted in an existing union agreement between the parties, dated January 16, 1942. The Board held that since printed copies of the agreement distributed to each employee carried the union's demand for a "union shop" in large type, "each member employee who remained a member after January 16, 1942, or who joined the union since, has therefore had due notice that as a result of agreement of the parties or an order of the War Labor Board, he might be obliged to remain a member in good standing for the duration of the contract, as a condition of employment. Under these circumstances, it is not unreasonable to assume that by failing to resign, or by subsequently joining, he has voluntarily accepted such an obligation."

SAN FRANCISCO HOTEL EMPLOYERS CASE

The union, a joint board of A. F. of L. Hotel and Restaurant Employees, was dissatisfied with the preferential-hiring clause in its previous agreement with the San Francisco Hotel Employers' Association, and asked for a "union shop" and preferential hiring as the only possible guaranty of union security. The employers were willing to continue the preferential-hiring arrangement, but were opposed to any further extension of union security.

The Board ordered (employee members dissenting) that a clause be inserted in the union agreement, rephrasing the previous hiring clause somewhat and adding membership maintenance as additional protection to the union.

In filling all vacancies and hiring additional or new help, except executives in solely supervisory capacity with power to hire and fire, and front office clerks, the individual hotels signatory hereto shall apply to the union having jurisdiction over the particular classification involved for the names of persons competent and available to fill such positions. In the event that the union claiming jurisdiction is not able to provide satisfactory and competent help the hotel which makes application to the union shall be at liberty to hire persons not members of the union. All persons so hired who are not members of the union may within 30 days after such hiring make application for membership in the union. If during such 30-day period satisfactory union members are available, such union members shall be engaged to fill these positions.

If an employer hires any person not a member of the union in accordance with the provisions of the paragraph above, such employer shall, within 24 hours of the time of such hiring, file in writing with the union on forms mutually satisfactory to the parties hereto, notice of such hiring.

Within 10 days of the date of this order, and on the first of every month thereafter, the several signatory unions shall file with the San Francisco Hotel Employers Association lists of union members in the several classifications of employees who are competent and available for work together with the types of hotels, locations and names, in which they have been accustomed to work. Within 10 days of the filing of each such list, any member hotel may file exception to the alleged job qualifications of any person on such list. Any differences between the parties respecting such qualifications are subject to the grievance procedure. Whenever any vacancy occurs in the staffs of any of the hotels, the hotel in which such vacancy occurs shall attempt to fill such vacancy from the lists provided by the signatory unions and in accordance with the general provisions hereof relative to preference for union members. * * *

All persons employed in any hotel now a member of the San Francisco Hotel Employers Association who, at the date of this agreement, are members, in good standing, of any of the unions signatory hereto and all persons employed by any of the member hotels who shall become members of any of the signatory unions after the date of this agreement shall be required, as a condition of employment, to retain their membership in such union in good standing during the life of this agreement.

RYAN AERONAUTICAL CO. CASE

The decision in this case together with those in the E-Z Mills and Ranger Aircraft Engines cases, issued between June 12, and June 18, constitutes an important development in the union-security controversy. For the first time two employer members of the Board concurred in the granting of a maintenance-of-membership clause by Board order. The clause, identical in the three cases, differed from previous maintenance-of-membership provisions in that a 15-day "escape" period, during which union members who did not wish to be bound by the clause might resign, was specifically provided. (This same clause was approved by a 6 to 0 unanimous vote of the Board in the Phelps-Dodge case on June 28th.) The clause, to be included in the agreements, reads as follows:

All employees who, 15 days after the date of the directive order of the National War Labor Board in this case, are members of the union in good standing in accordance with the constitution and by-laws of the union, and those employees who may thereafter become members shall, as a condition of employment remain members of the union in good standing during the life of the agreement.

The union shall promptly furnish to the National War Labor Board a notarized list of members in good standing 15 days after the date of the directive order. If any employee named on that list asserts that he withdrew from membership in the union prior to that date, the assertion or dispute shall be adjudicated by an arbiter appointed by the National War Labor Board whose decision shall be final and binding upon the union and the employee.

A summary opinion, signed by the four public members of the Board, outlined the course of the union-security controversy in cases coming before the War Labor Board and its predecessor, the National Defense Mediation Board. The opinion reiterates the reasons why the Board has felt compelled, even in the face of employer opposition, to grant membership maintenance:

The maintenance of membership, the maintenance of the contract, and the maintenance of production are parts of the interconnection of freedom and security, justice and democracy, production and victory. This maintenance-of-membership clause provides, during this war, for a free and fair basis for responsible union-management cooperation for all-out production. Management in the war industries has the guaranty for the duration of the war of continuous business without the usual risks to investments. The unions, with the unusual risks of the war pressure against strikes and general wage increases, except in the nature of equitable adjustments, need some security against disintegration under the impact of war. It is in the interest of equity that the union, which might win by a strike, the more complete security of the union shop or even the closed

shop, be assured the maintenance of the membership which it already has or may voluntarily acquire. It is in the interest of war production that the peaceful mediation and arbitration of this crucial issue by a public board be substituted for strikes and private wars in the midst of the war against Hitler and the Axis powers.

Finally, this maintenance of membership provides three basic guaranties: First, it guarantees democracy in America against the tragedy both of the disintegration of responsible unions during the war and against the defenselessness of industrial workers after the war; second, it guarantees, through responsible union leadership and stable union membership in the crucial transition from war to peace, against a violent revolution and the rise in America of a fascist, communist, or imperialistic dictatorship; and third, it affords one of our chief hopes that the all-out production for winning the war for freedom shall be converted into all-out production for winning the peace and for organizing plenty for America and for the stricken and hungry peoples still hopeful for freedom, justice, and peace all over the world.

In a separate opinion, Roger D. Lapham, employer member of the Board, explained his reasons for voting with the majority of the Board in these cases:

In previous union-maintenance decisions, the employer members of this Board in their dissenting decisions emphasized that the directive orders of the Board did not allow the individual affected to exercise in some form the right of withdrawal or resignation within a reasonable time. * * *

While in the present case, as well as in many others, the necessity of a union-maintenance clause is not apparent, I have voted with the public and labor members because they have met a main objection to any union maintenance-of-membership clause.

However, I believe, as pointed out in Mr. McMillan's dissenting opinion, that if this Board prescribes any form of union maintenance it should avoid compelling an employer to discharge a competent employee merely because he chooses not to continue his union membership. In these days of national emergency it would not seem in the public interest to compel discharge for this reason alone.

The dissenting opinion of E. J. McMillan, employer member of the Board, sums up the case against "union security" in these words:

I maintain that no agency of government should compel either party, against its wishes, to execute a contract containing a provision which compels the discharge of an employee who for some valid reason, known to him, may wish during the life of the contract to withdraw from the union. This, in my opinion, is not "good Government." No man in the present emergency should be denied by Government order the right to work and thus contribute to the success of our defense program because he does not wish to continue membership in a union.

If, for some valid reason, a man wishes to withdraw from a union, he should be permitted to honorably do so without losing his job; at the same time he should not object to fulfilling his financial obligation to the union during the life of the contract.

AMERICAN BRASS CO. CASE

Although the union in this case, the International Union of Mine, Mill & Smelter Workers (C. I. O.), asked for a union shop, the Board refused to grant such a clause or any form of membership maintenance. Instead, it unanimously ordered a voluntary and revocable check-off provision included in the agreement "because of the unanimous judgment of the Mediation Panel that it represents that form of union security best adapted to the needs of this particular situation."

CATERPILLAR TRACTOR CO. CASE

The membership-maintenance clause granted in this case was identical with that of the Phelps-Dodge and Ryan Aeronautical Co. cases already noted, but the Board's vote was divided 8 to 4, with

the employer members dissenting. The dissenting members proposed that unions, in return for union security, should be required to file with the War Labor Board (1) copies of constitutions and bylaws, (2) names of officers, (3) amount of dues and initiation fees, and (4) financial statements of receipts and expenditures.

Inasmuch as this Board has now established what appears to be a fixed policy under which it shall be giving some form of maintenance of union membership in any dispute where union security is asked, it seems only fair and reasonable to require that the unions receiving this advantage measure up to certain standards. If a Government agency is to give advantages not granted by legislative action, it should also impose upon the beneficiary certain conditions which Congress has not yet seen fit to require.

In a separate concurring opinion Wayne L. Morse, public member, answered the employers' dissenting opinion in saying:

The return of the Board to an 8 to 4 vote split on the union-maintenance issue involved in this case is very regrettable. It is particularly regrettable in view of the very sincere and conscientious efforts which the public members of the Board have made in their endeavors to bring the labor and employer members of the Board to a common ground of agreement on the union-security issue. In the early days of the Board, the views of the labor and employer members were diametrically opposed to each other on the issue.

* * * The position of the employer members of the Board, represented by this dissenting opinion, admits to asking the War Labor Board to legislate certain regulations upon unions, which Congress failed to do.

* * * It would be equally absurd to suggest that the War Labor Board should go into the financial practices and policies of employers and employer associations and police the same, as it would that they should follow such a course in connection with union finances. That is not what the War Labor Board has been set up to do.

"LITTLE STEEL" CASE

In this case, in addition to maintenance of membership with the 15-day "escape" clause, the Board ordered that agreements between the companies and the union include provision for the check-off of union dues and initiation fees for all union members.

The vote on this issue was 8 to 4, with the employer members dissenting. The majority opinion stated:

In this case the Board protects the rights of the majority and the minority, rejects the union's demand for a union shop and compulsory check-off, and rejects the companies' demand for no change in present union status. The Board decides in favor of the voluntarily accepted maintenance of membership and check-off of those members of the union who are in good standing on the fifteenth day after this directive order, or who may thereafter voluntarily join the union. * * *

The voluntary binding check-off on the basis of the special facts in this case, and not as a precedent for other cases, protects the free choice of the worker. If not in the union he is, of course, not subject to the check-off. If in the union, he may, within the 15-day period, get out rather than be bound by the check-off, and yet keep his job. The voluntarily accepted binding check-off will contribute to the security and stability of the union, and affords a basis for cooperation between the company and the union. Just as the union has the opportunity to cooperate with the company in maintaining shop discipline and promoting efficient production, so the company has the opportunity to cooperate with the union in its special problem of collecting dues. At present, the company forbids the collection of dues on company property, and provides no facilities anywhere for this purpose. The problem is further accentuated by the difficulties and complications of many different nationalities and races among the workers, the widely separated and far flung locations of mills and homes, and the limitations on transportation. Since some of the companies make deductions for several other authorized items due to the agencies and causes in which the companies believe or have an interest, steel workers often have the impression that the companies are opposed to the union because they do not check-off dues to the union.

The dissenting opinion of employer members of the Board repeated the proposal made in the Caterpillar Tractor Co. case; namely, a requirement that financial and other records of the union be filed with the War Labor Board. In addition the employer members proposed that—

There shall also be incorporated in the collective agreements, an undertaking by the union that it will not during the life of the agreement make, assume, guarantee, repay, or participate in any contribution, subscription, pledge, or other financial obligation to any political party or candidate for public office.

Cases Involving Jurisdiction of the Board

The scope of the Board's authority has been at issue in two important cases. In both the Board assumed jurisdiction over the case despite an employer challenge to its right to do so.

"Little Steel" case.—Counsel for the Youngstown Sheet & Tube Co. challenged the authority of the Board "to issue any directive order requiring anybody to enter into any kind of contract." Also, briefs filed by this company and the three other "Little Steel" companies—Bethlehem Steel Corporation, Republic Steel Corporation, and Inland Steel Co.—raised certain legal questions regarding the Board's power to rule on the issue of union security. Principally, it was contended that a union-maintenance clause would be in violation of Section 8 of the National Labor Relations Act, which forbids discrimination by an employer to encourage or discourage membership in any labor organization.

In rejecting the broad challenge to its authority, the Board held—

The National War Labor Board was created through the exercise of the President's war power. Hence the jurisdiction, powers, and duties of the Board stem directly from the war powers of the President. The Board functions as a war agency. It is directly responsible to the President and obligated to exercise the powers and carry out the policies entrusted to it by the President. The arguments advanced by counsel for the companies questioning the jurisdiction of the Board fail to take into account this fact.

The objections to the jurisdiction of the Board overlook the fact that there is inherent in the war powers of the President the authority to take such steps as may be necessary to prevent and settle labor disputes which threaten to disrupt the successful prosecution of the war. The President of the United States as Commander-in-Chief of the armed forces of this nation, burdened with the duty of seeing that our armed forces are not only successfully directed but also are adequately supplied with the weapons of war, has by Executive order entrusted to the National War Labor Board the duty of finally determining all labor disputes which "might interrupt work which contributes to the effective prosecution of the war."

With regard to the other issue raised by the companies—the possible conflict between union security and the N. L. R. A.—the Board's opinion stated:

On September 11, 1941, the President of the United States suggested to the Chairman of the then existing National Defense Mediation Board that the Board consider, with the National Labor Relations Board, the question now under discussion. This was done, and the general counsel of the National Labor Relations Board confirmed the opinion of the National Defense Mediation Board and reached the conclusion "(1) that the proviso to Section 8 (3) makes it lawful under the National Labor Relations Act * * * for an employer to make an agreement with an unassisted union, which is the exclusive representative of the employees in an appropriate unit, requiring as a condition of employment that such employees be members of the contracting union; (2) that the proviso is not confined to the closed-shop variety of contract; and (3) that an employer does not engage in unfair labor practices within Section 8 of the National Labor Relations Act by including in a contract with a proper labor organization, a maintenance-of-membership clause."

Montgomery Ward & Co. case.—The Board unanimously decided to take jurisdiction in this case despite the company's claims that it produced no war materials, had no Government contracts, and did not distribute retail articles which could not be readily obtained by purchasers elsewhere.

The Board's decision stated:

These are days when the Government must act in the interests of maintaining to the maximum extent possible a smooth-working war economy uninterrupted by "industrial civil wars" within our domestic economy. We cannot win this war, at least without an unnecessary loss of men, if as a nation we permit employers and labor organizations to disrupt our war effort by strikes and lock-outs. This particular dispute involves so many employees, and would affect the life of a very important industrial center to such a degree, that there is no doubt whatever in the minds of the members of the Board that the dispute falls within the jurisdiction of the Board. * * *

The Board wishes to call the attention of the company to the fact that it is one thing for a long-suffering and patient public to stand by during peacetime while American employers and labor unions settle their differences by contests of economic force in the form of lock-outs and strikes, but it is quite another thing to expect the American public or its government, faced with the vital task of winning this war, to stand by while the Montgomery Ward Co., or any other important business concern carries on a fight with labor under the guise that it has the right to do so because the fight doesn't affect the prosecution of the war. * * *

The War Labor Board appreciates the fact that the line of demarcation between so-called labor disputes which do not affect the prosecution of the war and those which do, is not a clear and definite one existing between fixed knowns. Very good arguments can be made in support of the proposition that any labor dispute no matter how minor in nature is most certain, at least in some degree, to register a detrimental effect upon the war effort. There unquestionably is a general acceptance on the part of patriotic Americans, that *all* strikes and lock-outs in *all* industries to *all* degrees should be considered out for the duration of the war, and the differences between the disputants should be settled by the peaceful procedures of mediation, conciliation and arbitration.



ORGANIZATION OF UNITED STEELWORKERS OF AMERICA

THE first constitutional convention of the United Steelworkers of America met in Cleveland, Ohio, from May 19 to May 23, 1942, to formulate and adopt a constitution setting forth the basic principles under which the union is to operate as a permanent democratic institution. The convention was attended by approximately 1,700 delegates, representing over 600,000 steel workers. It was at this convention also that the temporary organization structure of the Steel Workers Organizing Committee was replaced by a permanent organization, and the new name, "United Steelworkers of America," was adopted.

Major Aims

The primary objectives of the United Steelworkers of America, as given in the newly adopted constitution, are as follows:

1. To unite into one industrial union, regardless of race, creed, color, or nationality, all men and women employed in and around iron and steel manufacturing, processing, and fabricating mills and factories in the United States and Canada. Persons with power to hire and fire are specifically excluded. Workers who possess some degree of supervisory power but do not have the right to hire and fire are eligible to membership, provided they receive the approval of the local union and the international executive board.

2. To establish through collective bargaining adequate wage standards, shorter hours of work, and improvement in the conditions of employment for workers in the industry.

3. To secure legislation, safeguarding the economic security and welfare of the workers in the industry, to protect and extend the Nation's democratic institutions, civil rights and liberties, and thus to perpetuate the cherished traditions of democracy in the United States.

Officers and Their Duties

The officers of the international union are a president, 2 assistants to the president, a secretary-treasurer, 3 international tellers, 39 district directors, and a national director for Canada. This group comprises the executive board of the union.

The officers are elected to serve for a period of 2 years, except that those elected at the first constitutional convention in May 1942 will hold office until May 31, 1945. With the exception of district directors, all officers of the international are to be elected by referendum vote of all members of the union. District directors are to be elected by a referendum vote of members of the union within each district. The procedure for nomination and the various steps involved in the election and in checking the results of the election are given in great detail in the constitution, to safeguard the democratic rights of the members of the organization.

To be eligible as a candidate for office in the United Steelworkers of America, a member must be in good standing, be a citizen of the United States or Canada (or one who has formally declared his intention of becoming a citizen), and have worked at least 3 years in a mill or a plant within the jurisdiction of the United Steelworkers of America. No worker is permitted to hold more than one salaried office at any one time.

The constitution provides that the president of the United Steelworkers of America shall receive an annual salary of \$20,000 and all legitimate expenses incurred in the course of performing his duties away from the international office. The two assistants to the president and the secretary-treasurer of the union are each to receive a salary of \$12,000, and each district director \$4,320 per annum.

President.—Among the functions and duties of the president of the United Steelworkers of America are the following:

1. To attend and preside at all international conventions of the international union and at all meetings of the executive board.
2. To convene special meetings of the executive board when necessary.
3. To interpret the meaning of the constitution and direct the affairs of the union subject to review and approval by the executive board.
4. To appoint, direct, suspend, or remove organizers, representatives, agents, and employees of the union and to fix their compensation, subject to approval by the executive board.
5. To make jointly with the secretary-treasurer a full report to the convention on the administration of their offices and the affairs of the union.

Secretary-treasurer.—It is the duty of the secretary-treasurer—

1. To keep records of all convention proceedings and of all sessions of the executive board.
2. To be responsible for and to preserve all books, documents, and effects of the international office, except those belonging to the president of the union.
3. To arrange for maintenance of financial books and records, receive and deposit funds in the name of the union, and to invest funds in excess of current needs in securities determined by the executive board.
4. To pay all bills and current expenses, unless otherwise ordered by the president.

Executive board.—The executive board of the international union must meet at least twice each year. Its duties are, among others, to enforce the constitution and to direct the affairs of the international union between conventions. The executive board has the power to remove from office any one of its members after trial if found guilty of dishonesty, malfeasance, or maladministration, or if expelled from his local union in accordance with the provisions of the constitution. It has the power to fill vacancies on the board, except in the case of district directors, who are to be elected from the district where the vacancy occurs by a special referendum conducted in the same manner as the regular elections.

Conventions of the Union

Regular conventions must be held every 2 years beginning on the second Tuesday in May at a place designated by the executive board. Delegates to the convention must be elected at a special meeting of the local union or by a referendum vote. No member is eligible to be a delegate to the convention unless—

1. He has been in continuous good standing for a period of 12 months immediately preceding the convention; or, if his local has been in existence for less than 12 months, has been in continuous good standing from the time he joined the union;
2. He has attended at least one-half of the regular meetings of his union during the preceding 6 months, unless prevented by union work or working hours; and
3. He is employed in a plant or mill within the jurisdiction of the union or is one of the staff of representatives of the international office.

Relations with Local Unions

Membership in the international union can be held only through membership in a local union. The constitution of the United Steelworkers of America sets forth in detail the procedure to be followed in establishing a local union, the method used in obtaining a charter, holding membership meetings, electing of officers, and other details involved in the management of a local union.

The constitution aims to establish a clear policy in the relationships between the individual member and his local union on the one hand and between the local union and the international organization on the other. Local unions are permitted to adopt their own bylaws and are given latitude in managing their affairs, but their procedures or regulations must not conflict with the constitution or the policies adopted by the international union. The constitution also requires that the international union shall be a party to every collective-bargaining agreement concluded by a local union, and further stipulates that no strike is to be called by a local without the approval of the international president.

A local union may be established if 10 or more persons eligible for membership apply to the executive board for a charter of affiliation. Local unions are required to enforce the constitution of the international union, to hold general membership meetings at least once a month, and to become affiliated with the appropriate local and State industrial union councils.

All local unions are directed to elect their officers and grievance committeemen at the last meeting in June of each year. To be eligible as a candidate for a local union office, a member must have

been in continuous good standing for the 12 months immediately preceding the election, except in the case of a new local union in existence for less than 12 months. He must be employed in a plant or mill within the jurisdiction of the union and must have attended at least half of the meetings of the local union during the 6 months preceding the election, unless prevented from attending by union activities or by his working hours.

Union Finances

The constitution of the United Steelworkers of America prescribes a maximum membership initiation fee of \$3. Regular dues are \$1 per month. Where conditions warrant, changes may be made in the regular dues, subject to approval by the executive board, but in no case shall the dues exceed \$1.50 per month, unless higher dues prevailed in the local union prior to the adoption of this constitution.

The initiation fee and dues are collected by the local union and must be deposited at a bank, as a trust fund held for the international union. Within 15 days after the close of each month, the local union must forward to the secretary-treasurer of the United Steelworkers of America all money collected in initiation fees and dues during the preceding month. One-third of the initiation fee payments and 75 cents of each member's dues are retained by the international office, and the remainder is refunded to the local union.

Failure to remit the full amount of initiation fees and dues collected by a local union constitutes ground for suspension of the local union. Such suspended unions can be reinstated only after they have filed all delinquent reports and have complied with the penalties set by the executive board.

The executive board may waive the payment of initiation fees when it feels that such action will promote the growth and interest of the union. Members of a local union who have not worked 5 days in any one month, through no fault of their own, are excused from the payment of dues.

The executive board of the international union is charged with the duty of seeing that the books of its secretary-treasurer are audited by certified public accountants twice a year. Copies of this audit must be submitted to all local unions. The accounts of the local unions must be open for examination by an auditing committee from the local whenever required. Financial records of the local are also subject at all times to audit by the secretary-treasurer of the United Steelworkers of America.

Health and Industrial Accidents

INDUSTRIAL INJURIES IN THE UNITED STATES DURING 1941

By MAX D. KOSSORIS, Bureau of Labor Statistics

Summary

AS A general rule, the number of disabling work injuries during 1941 increased much more sharply than did either total employment or the total number of employee-hours worked. Particularly was this true of manufacturing industries. For the 21,422 manufacturing establishments which reported to the Bureau of Labor Statistics for both 1940 and 1941, employment increased by 21 percent, employee-hours worked by 28 percent, and disabling injuries by 46 percent. As a result, the frequency rate, measuring the average number of injuries per million hours worked, was 14 percent higher in 1941 than in 1940. This increase in the frequency rate is attributable to the influx of large numbers of inexperienced workers into the rapidly expanding war industries, the crowding of workers in the wartime factories, and the failure of safety activities to keep fully abreast of the war program.

Industrial injuries are for the most part preventable, and yet their daily toll is one of the most significant causes of time lost from work in the United States. In 1941, according to estimates of the Bureau of Labor Statistics they resulted in 19,200 deaths, 100,600 permanent impairments, and 2,060,400 temporary disabilities. The workers injured in 1941 lost 42,083,000 days of work in that year. In addition, however, death and permanent disability will result in lost time or in lost effectiveness in future years. This amounts to 209,000,000 days. Similar injuries in earlier years resulted in lost time in 1941 of which there is no direct measure. The best single approximation of total time lost in 1941 because of injuries is therefore the sum of time lost in 1941 for disabilities incurred in that year plus the economic equivalent of permanent disabilities and deaths, a total of 251,000,000 days. This is equivalent to full-time employment for a year for more than 800,000 workers. These tremendous losses of manpower during a time requiring maximum production for war constitute a challenge to management to undertake more extensive and intensive safety efforts.

The weighted frequency rate for the entire manufacturing group was 18.1 injuries per million employee-hours worked. The 27,749 establishments reported an exposure of 6,122,000 employees with a total of 12,621,321,000 hours worked, and an injury total of 225,900. Of the reported injuries, deaths and permanent total disabilities accounted for about one-half of 1 percent, permanent partial impairments for about 5½ percent, and temporary total disabilities for the

remainder, or 94 percent. As would be expected, most of the permanent partial injuries involved fingers or the hand. Injuries to these members accounted for 77 percent of the total of permanent impairments, impairments of the foot or toes for 7 percent, enucleation or impairment of vision for 5 percent, damage to arm or leg 3 percent each, and miscellaneous body impairments for the remainder. In the first rank, for having the highest percentage of lost or impaired fingers or hands, was the folding-box industry, with 94 percent, followed closely by the stamped and pressed metal products and the partitions, shelving, and store fixtures industries, each with 93 percent. The highest percentage of permanent injuries to legs occurred in the fertilizer industry, with 18 percent; and the logging industry came second, with 15 percent. Outstanding for high percentages of lost or impaired feet or toes were the fertilizer, petroleum-refining, soap, sugar-refining, logging, and special-industry-machinery industries. Eye impairments ranked relatively high in the ornamental metalwork, logging, pulp, and the brick, tile, and terra cotta manufacturing industries, and streetcar and bus transportation.

Altogether, nearly 52,000 establishments with about 7,500,000 workers were covered in the Bureau's 1941 survey of both manufacturing and nonmanufacturing industries. These employees worked during 1941 about 15,260 million hours, and during that exposure suffered nearly 258,000 disabling injuries. Of these, 1,268 were deaths, 167 permanent total disabilities, 13,297 permanent partial impairments, and 242,958 temporary total disabilities.

Utilizing all available reports so as to have the largest possible exposure in each industry surveyed, the Bureau found that the logging industry in 1941 occupied its usual rank as the industry with the highest frequency rate, or 96.3 injuries per million hours worked. This means that there was approximately 1 injury for every 5 men employed throughout the year. Considerably lower, but still exceeding the rate of any other manufacturing industry were sawmills, with a rate of 54.5. Other manufacturing industries with frequency rates in excess of 30 were slaughtering and meat packing (30.9), fabricated structural steel (35.7), forgings (44.5), foundries (47.0), steam fittings and apparatus (32.5), planing mills (39.3), wooden containers (44.9), machinery-repair shops (35.8), corrugated boxes (32.7), fiber boxes (33.4), brick, tile, and terra cotta (38.2), concrete, gypsum, and plaster products (46.7), and cut stone and stone products (33.4).

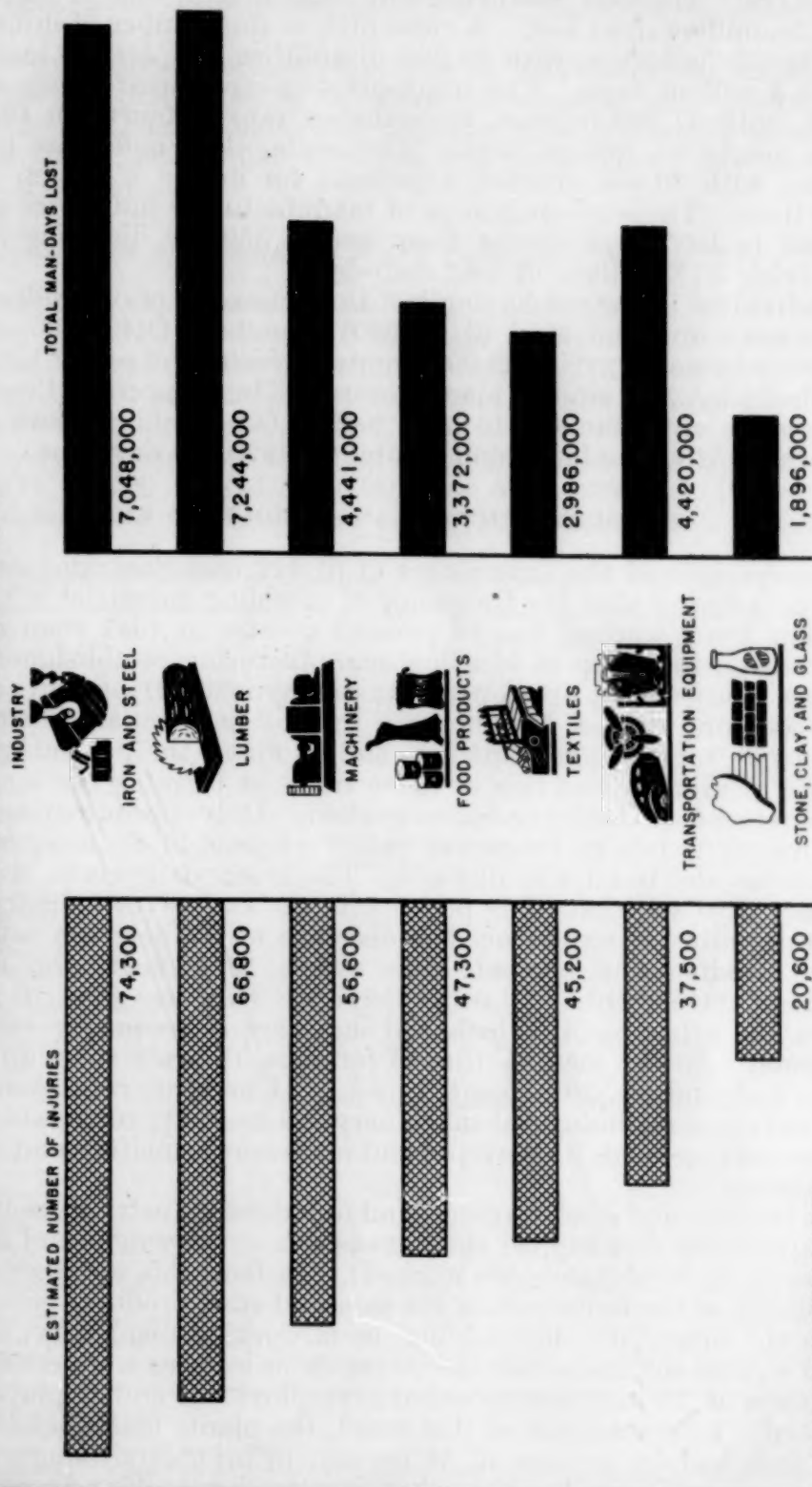
Of particular interest is the experience of establishments manufacturing critical war materials. The explosives industry averaged only 5.7 disabling work injuries per million hours worked. In forgings and foundry establishments these averages were 44.5 and 47.0, respectively. Manufacture of ammunition averaged 32.1; of guns and related equipment, 29.8; shipbuilding, 26.4; manufacture of tanks, 18.3; and the aircraft industry, 10.4.

ESTIMATES FOR INDIVIDUAL INDUSTRIES

Continuing the practice, started last year, of providing general estimates of work injuries for individual manufacturing industries, the Bureau made similar estimates for 1941. The iron and steel group in itself was estimated to have had 74,300 disabilities, accounting for 7 million lost man-days. The lumber industries group followed with

MANUFACTURING INDUSTRIES EXPERIENCING MORE THAN 20,000 INDUSTRIAL INJURIES IN 1941

CHART 1



UNITED STATES DEPARTMENT OF LABOR
BUREAU OF LABOR STATISTICS

66,800 disabling work injuries, but with $7\frac{1}{4}$ million lost man-days. The machinery group ranked third with 56,600 injuries and $4\frac{1}{2}$ million lost days. The food products group came fourth, with 47,300 injuries and $3\frac{1}{2}$ million days lost. A close fifth in the number of injuries was the textile industry, with 45,200 disabilities and a time loss of not quite 3 million days. The transportation-equipment group, sixth in rank, with 37,500 injuries, nevertheless ranked fourth in time lost, with nearly $4\frac{1}{2}$ million days. The stone, clay, and glass products group, with 20,600 injuries, accounted for nearly 2 million days of lost time. These seven groups of manufacturing industries are estimated to have had among them nearly 350,000 disabling injuries, involving $31\frac{1}{2}$ million of lost man-days.

Individual industries having lost time in excess of one million man-days were iron and steel (2,259,000), foundries (1,483,000), general industrial machinery (1,229,000), motor vehicles and parts (1,313,000), shipbuilding, and aircraft manufacture. These six critical war industries alone are estimated to have had 86,600 disabling work injuries (of which 520 were fatal) and a total of 8,820,000 days lost.

EXPOSURE, INJURIES, AND FREQUENCY RATES

Comparison of the experiences of 21,422 manufacturing establishments indicates that the frequency of disabling industrial injuries per million hours worked was 14 percent greater in 1941 than in 1940. For the entire group of identical manufacturing establishments, disabling injuries went up 46 percent; employment, 21 percent; and employee-hours worked, 28 percent. In most individual industries the frequency rate changed upward, and in many the percentage of increase in injuries was two or more times as large as the increase in employment or employee-hours worked. Only 15 industries showed downward trends in frequency rates, whereas in 80 manufacturing industries the trend was upward. The greatest decrease in the frequency rate was that of 59 percent, in the explosives industry. The aircraft industry experienced a decrease of 20 percent; rayon and allied products, 16 percent; coke ovens, 12 percent; and women's clothing, 11 percent. All other decreases were less than 10 percent.

On the other hand, substantial increases in frequency rates were common. In the manufacture of forgings, the rate went up 40 percent; in foundries, 30 percent; tinware, 34 percent; confectionery, 45 percent; general industrial machinery, 29 percent; corrugated boxes, 62 percent; cement, 35 percent; and nonferrous smelting and refining, 35 percent.

In the iron and steel, forgings, and foundries industries, the increases in injuries far outstripped the increases in employment and exposure hours (i. e., employee-hours worked). In fact, this was true of practically all of the industries in the iron and steel products group.

In the important shipbuilding, metalworking machinery, and railroad equipment industries the increases in injuries were considerably in excess of the increases recorded in employment and employee-hours worked. Characteristic of this trend, the plants manufacturing rubber tires had an increase of 54 percent in injuries although employment and employee-hours worked increased only 17 percent and 26 percent, respectively. On the contrary, in the aircraft industry the proportionate increase in injuries was substantially less than the rise in either employment or in hours worked.

100,600, or about 12 percent. Temporary total disabilities, however, rose from 1,782,000 in 1940 to 2,060,400 in 1941, or 16 percent. The fatality figures, as in the past, include a small number of permanent total disabilities.

The construction-industry group was estimated to have had the largest number of injuries, 495,500. Manufacturing was a close second with 452,700 injuries, an increase of about 43 percent over the 1940 estimate of 316,000. In the number of fatalities, agriculture led with 4,500, and construction ranked second with 4,100. Manufacturing, which had 1,900 fatalities in 1940, had 2,400 in 1941. Another sharp increase in both injuries and fatalities occurred in the railroad industry, where the number of injuries rose from 33,700 to 48,200, and fatalities from 700 to 1,100, increases of 43 and 57 percent, respectively.

Survey Data

Deviating from the practice followed in the past of presenting injury rates only for identical establishments reporting for the year surveyed and the one preceding it, the rates for 1941 are based on the entire reporting group. A new table (table 3), shows the degree and direction of change in 1941 from 1940 in frequency and severity rates, and is based on identical establishments reporting for the two years. In this way it was possible to compute the injury rates on the basis of all available reports, and compute change from reports of identical establishments, thus preserving comparability.

MANUFACTURING INDUSTRIES

The entire manufacturing group averaged 18.1 disabling injuries per million employee-hours (table 2). This was a weighted frequency rate, with the experience of each industry weighted in the composite total on the basis of employment. Similarly, for each 1,000 hours worked, 1.7 days were lost because of injuries. Putting the two rates on a strictly comparable basis, for every million employee-hours worked 18.1 workers were disabled and 1,700 days were lost, or an average of 94 days per injured worker. This average, however, includes not only days of disability, but the time charges for deaths, permanent total disabilities, and for impaired arms, hands, fingers, legs, feet, toes, or eyes as well, in the case of permanent partial disabilities.

Manufacturing industries with outstandingly high frequency rates have already been cited. At the other end of the scale are a number of industries with very low frequency rates: Explosives, 5.7; boots and shoes, 7.6; news and periodical printing and publishing, 7.6; bookbinding, 6.5; cement, 7.4; men's and women's clothing, 6.7 and 3.6, respectively; knit goods, 6.5; tobacco products, 6.2; radios and phonographs, also 6.2; and coke ovens, 4.3.

NONMANUFACTURING INDUSTRIES

Among the nonmanufacturing industries, construction had the highest frequency rate. The rate of 47.5 for the group is a weighted rate. Heavy engineering establishments had the highest frequency rate, 68.0. Highway construction followed, with a rate of 55.9, and building construction had the lowest rate, 41.8. Not shown separately in table 2 is the rate of 210.2 for 6 wrecking establishments with 220 employees—indicative of the hazard in these operations.

TABLE 2.—*Injury Rates and Injuries by Extent of Disability, 1911*
[All reporting establishments]

Industry	Number of establishments	Number of employees	Employee-hours worked (thousands)	Number of disabling injuries				Total time lost (days)	Injury rates ²	
				Total	Resulting in—				Frequency	Severity
					Death and permanent total disability ¹	Permanent partial disability	Temporary total disability			
All industries	51,826	7,417,383	15,260,435	257,600	(167)	1,435	242,958	24,965,630	318.1	31.7
Total, manufacturing	27,749	6,122,014	12,621,320	225,869	(153)	1,152	212,105	21,858,601	318.1	31.7
Chemical products	1,882	372,303	740,333	8,828	(8)	112	8,251	1,371,364	12.2	1.8
Druggist preparations	273	34,201	69,185	625	(1)	0	595	35,287	9.0	.5
Explosives	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	5.7	1.8
Fertilizers	367	19,142	36,115	1,001	(3)	15	964	148,878	27.7	4.1
Paints and varnishes	399	24,592	50,449	1,748	(1)	4	25	76,253	14.8	1.5
Petroleum refining	210	89,759	177,966	1,766	(1)	41	1,624	409,255	9.9	2.3
Rayon and allied products	30	51,923	104,047	1,000	(1)	9	945	116,152	9.6	1.1
Soap	88	22,032	44,587	486	(1)	0	451	66,925	10.9	1.5
Not elsewhere classified	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	14.4	2.1
Food products	3,218	360,977	723,278	18,020	(7)	56	17,138	1,346,483	23.4	1.7
Baking	806	53,819	118,499	1,779	(1)	6	1,680	151,739	15.0	1.3
Canning and preserving	478	61,063	96,549	2,893	(1)	12	2,818	174,008	30.0	1.8
Confectionery	254	35,118	69,552	1,122	(1)	1	1,090	61,398	16.1	.9
Flour, feed, and other grain-mill products	604	33,807	71,086	1,560	(2)	12	1,499	142,385	21.8	2.0
Slaughtering and meat packing	253	123,054	250,973	7,746	(3)	15	7,260	597,456	30.9	2.4
Sugar refining	77	15,926	34,613	977	(3)	3	82	119,535	28.2	3.5
Not elsewhere classified	746	38,190	81,406	1,943	(1)	7	1,899	99,962	23.9	1.2
Iron and steel and their products	3,295	1,123,752	2,368,124	47,976	(51)	317	44,696	4,994,178	22.5	2.1
Iron and steel	335	579,550	1,197,977	12,246	(10)	182	11,063	2,172,007	10.2	1.8
Cutlery and edge tools	103	12,535	26,785	554	(1)	1	532	29,515	20.7	1.1
Enameling and galvanizing	83	15,289	31,458	899	(1)	1	833	72,251	28.6	2.3
Fabricated structural steel	313	38,785	81,396	2,907	(1)	14	2,742	238,737	35.7	2.9
Forgings	101	21,044	48,957	2,181	(1)	7	2,075	135,963	44.5	2.8
Foundries	633	128,903	277,022	3,008	(19)	57	12,564	893,217	47.0	3.2
Hardware	190	39,160	83,225	1,615	(8)	15	1,436	262,711	19.4	2.4
Ornamental metalwork	119	12,309	25,306	466	(2)	5	420	77,507	18.4	3.1
Plumbers' supplies	94	36,811	77,954	1,381	(3)	7	1,274	119,237	17.7	1.5
Stamped and pressed metal products	321	39,372	83,398	2,423	(2)	2	2,160	238,302	20.1	2.9
Steam fittings and apparatus	223	34,482	74,952	2,433	(1)	5	2,323	150,303	32.5	2.0
Stoves and furnaces, not electric	237	45,114	92,180	2,729	(6)	12	2,588	227,149	29.6	2.5

See footnotes at end of table.

See footnotes at end of table.

TABLE 2.—*Injury Rates and Injuries by Extent of Disability, 1941—Continued*

Industry	Num-ber of estab-lish-ments	Number of employees	Employee-hours worked (thousands)	Number of disabling injuries			Injury rates ²	
				Total	Resulting in—	Total time lost (days)	Fre-quency	Sever-ity
					Death and permanent total disability ¹	Perma-nent partial disability	Tempo-rary total disability	
<i>Manufacturing—Continued</i>								
Iron and steel and their products—Continued.								
Tinware.....	79	22,684	47,408	996	0	106	890	21.0
Tools, except edge tools.....	130	20,407	45,712	1,136	1	67	1,068	24.9
Wire and wire products.....	140	25,849	53,484	1,016	2	74	940	19.0
Not elsewhere classified.....	194	51,458	120,911	1,986	(2)	192	1,788	16.4
Leather and its products.....	679	165,950	327,757	4,063	(3)	167	3,883	11.8
Leather.....	164	36,457	75,274	2,005	(3)	81	1,915	26.6
Boots and shoes.....	415	121,258	236,140	1,793	2	69	1,722	7.6
Not elsewhere classified.....	100	8,235	16,343	265	2	17	246	16.2
Lumber, lumber products, and furniture.....	4,007	344,681	692,848	26,348	(11)	1,398	24,792	41.4
Logging.....	281	22,233	40,477	3,897	(1)	59	3,747	96.3
Planing mills.....	999	62,819	131,596	5,167	(2)	15	4,870	424.318
Sawmills.....	833	64,784	127,463	6,944	(4)	56	6,576	876.691
Furniture, except metal.....	1,027	109,529	220,415	4,864	(3)	374	4,479	400.687
Furniture, metal.....	102	21,931	46,733	1,007	0	70	931	49.407
Furniture, shelving, and store fixtures.....	125	8,318	17,038	370	0	44	326	36.103
Partitions, shelving, and store fixtures.....	42	2,861	5,865	80	(1)	2	77	9.084
Morticians' supplies.....	340	33,105	64,116	2,882	13	147	2,722	230.212
Wooden containers.....	258	19,101	39,147	1,143	3	76	1,064	107.508
Not elsewhere classified.....								
Machinery (not transportation).....	3,000	925,786	2,058,561	34,570	(13)	99	32,314	803.873
Agricultural machinery and tractors.....	164	72,303	147,862	3,800	(1)	6	3,462	334.173
Construction and mining machinery.....	274	58,969	132,991	3,913	(2)	21	3,743	299.483
Electrical equipment and supplies.....	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
Food-products machinery.....	133	17,912	39,574	962	(1)	4	887	87.794
Metalworking machinery.....	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
Textile machinery.....	148	27,173	60,532	954	(1)	3	907	71.008
Special industry machinery, not elsewhere classified.....	371	59,724	136,376	3,100	(3)	11	2,943	332.773
General industrial machinery.....	799	192,970	434,481	9,705	(2)	25	9,173	646.904
Machinery, not elsewhere classified.....	122	64,617	140,823	1,223	5	126	1,092	156.942
Repair shops.....	248	4,676	9,988	358	0	10	348	18.517
Paper and allied products.....	1,578	295,768	563,308	13,073	(1)	61	12,408	288.693
Pulp.....	30	13,962	29,656	808	6	44	818	115.129

Paper.....

Pulp.....	1,578	265,768	563,308	13,073	(1)	61	604	12,408	48,511	35.8	1.9
Paper.....	347	91,035	195,894	2,221	(1)	24	257	4,960	510,362	26.7	2.7
Paper and pulp (integrated).....	79	48,065	103,195	2,450	(1)	24	181	2,730	326,117	23.4	3.2
Folding boxes.....	100	14,039	30,700	734	(1)	3	30	48,758	46,588	12.2	1.5
Set-up boxes.....	410	23,632	47,594	582	(1)	0	50	532	70,448	32.7	1.9
Corrugated boxes.....	128	17,685	37,029	1,212	(1)	0	30	1,162	7,820	33.4	1.4
Fiber boxes.....	25	3,623	113,528	1,818	(1)	5	86	1,727	154,089	16.0	1.4
Not elsewhere classified.....	379	54,220	329,635	2,596	(3)	15	122	2,459	241,677	37.8	3.7
Printing and publishing.....	2,799	166,008	108,111	1,374	(1)	9	83	1,282	140,493	8.2	.8
Book and job.....	1,866	82,974	158,451	1,202	(2)	6	38	1,158	100,426	7.6	.6
News and periodical.....	886	81,513	3,073	20	(1)	0	1	19	758	6.5	.2
Bookbinding.....	47	1,521	182,315	2,943	(1)	12	115	2,816	234,955	16.2	3.1
Rubber and its products.....	204	89,851	81,622	1,061	(1)	9	35	1,017	122,568	13.0	1.5
Rubber tires.....	44	41,235	31,284	1,488	(1)	1	12	381	24,830	12.6	.8
Rubber boots and shoes.....	22	15,145	69,409	1,488	(1)	2	68	1,418	87,557	21.4	1.3
Not elsewhere classified.....	138	33,471	404,704	9,544	(20)	62	305	9,177	840,197	26.5	3.2
Stone, clay, and glass products.....	1,512	204,590	87,112	3,324	(4)	13	60	3,251	188,411	38.2	2.2
Brick, tile and terra cotta.....	541	45,008	144,021	2,505	(1)	13	46	3,022	140,956	7.4	3.0
Cement.....	140	24,381	40,379	877	(6)	9	14	2,413	149,481	17.4	1.0
Glass.....	201	73,593	25,523	1,193	(3)	9	45	854	74,808	17.8	1.5
Pottery.....	100	24,784	7,835	262	(5)	5	8	1,349	123,831	46.7	4.9
Concrete, gypsum, and plaster products.....	173	12,181	4,147	1,022	(1)	10	43	969	39,293	33.4	5.0
Cut stone and cut-stone products.....	144	4,147	42,034	1,022	(1)	10	43	969	117,327	24.3	2.8
Not elsewhere classified.....	113	20,496	1,739,753	21,189	(6)	45	818	20,326	1,446,844	10.9	3.7
Textiles and their products.....	3,742	897,967	72,008	929	(1)	6	71	852	152,482	12.9	2.1
Carpets and rugs.....	78	36,901	196,541	1,309	(1)	3	19	1,287	57,475	6.7	.3
Clothing—men's.....	652	108,807	112,044	405	(1)	0	17	388	32,988	3.6	.3
Clothing—women's.....	494	61,915	558,694	8,510	(1)	11	320	8,179	512,389	15.2	.9
Cotton goods.....	494	276,134	79,912	1,413	(1)	5	62	1,346	126,278	17.7	1.6
Dyeing and finishing.....	206	46,175	249,126	1,630	(1)	4	33	1,593	72,476	6.5	.3
Knit goods.....	661	133,763	96,218	1,094	(1)	2	26	1,066	45,875	11.4	.5
Silk and rayon products, not elsewhere classified.....	214	52,688	258,110	4,003	(2)	10	183	3,810	318,259	15.5	1.2
Woolen goods.....	358	128,704	117,040	1,896	(1)	4	87	1,805	128,622	16.2	1.1
Not elsewhere classified.....	427	58,880	1,894,720	28,208	(28)	164	2,028	26,016	3,332,155	14.5	3.7
Transportation equipment.....	652	912,326	702,088	6,527	(1)	27	618	5,882	785,559	9.3	1.1
Motor vehicles.....	183	350,831	()	()	()	0	()	()	()	26.4	3.0
Shipbuilding.....	()	()	()	()	()	0	()	()	()	17.8	2.9
Railroad equipment.....	()	()	()	()	()	0	()	()	()	10.4	1.4
Aircraft.....	()	()	()	()	()	0	()	()	()	21.2	1.2
Motor-vehicle parts.....	80	54,341	113,948	2,413	()	3	121	2,289	132,747	29.0	9.6
Motor-vehicle parts.....	()	()	()	()	()	0	()	()	()	15.7	1.7
Boatbuilding.....	86	11,209	26,529	416	()	2	20	394	46,113	15.7	1.7
Not elsewhere classified.....	()	()	()	()	()	0	()	()	()	874,621	31.5
Miscellaneous manufacturing.....	1,146	261,316	531,992	7,161	(1)	35	566	6,560	874,621	6.2	.4
Tobacco products.....	221	50,885	95,418	594	(1)	1	28	565	42,624	6.2	1.4
Radio and phonographs.....	58	43,514	84,765	525	()	0	70	455	116,892	6.2	1.4
Smelting and refining (nonferrous).....	()	()	()	()	()	0	()	()	()	20.1	3.0
Nonferrous metal products.....	()	()	()	()	()	0	()	()	()	21.7	1.7
Brushes.....	48	3,396	7,253	103	()	0	4	99	4,488	14.2	.6

See footnotes at end of table.

TABLE 2.—Injury Rates and Injuries by Extent of Disability, 1941—Continued

Industry	Num-ber of estab-lish-ments	Number of employees	Employee-hours worked (thousands)	Number of disabling injuries				Injury rates ²	
				Total	Resulting in—			Fre-quency	Sever-ity
					Death and permanent total disability ¹	Perma-nent partial disability	Tempo-rary total disability		
<i>Manufacturing—Continued</i>									
<i>Miscellaneous manufacturing—Continued.</i>									
Brooms.....	41	1,680	3,305	64	0	2	62	19.4	0.7
Coke ovens.....	50	15,440	32,983	141	7	12	122	4.3	2.1
Not elsewhere classified.....	338	39,599	81,412	1,000	2	97	901	12.3	1.1
Ordnance and accessories.....	(*)	(*)	(*)	(*)	(*)	(*)	(*)	21.1	1.4
Guns and related equipment.....	(*)	(*)	(*)	(*)	(*)	(*)	(*)	29.8	1.3
Ammunition, except for small arms.....	(*)	(*)	(*)	(*)	(*)	(*)	(*)	32.1	3.7
Tanks.....	(*)	(*)	(*)	(*)	(*)	(*)	(*)	18.3	1.2
Not elsewhere here classified.....	(*)	(*)	(*)	(*)	(*)	(*)	(*)	10.9	.4
<i>Nonmanufacturing</i>									
Construction.....	\$ 2,740	98,224	161,183	8,033	90	236	7,707	37.5	3.7
Building.....	\$ 2,246	62,233	99,653	4,166	27	120	4,019	41.8	4.3
Heavy engineering.....	\$ 128	17,574	32,755	2,228	46	83	2,099	68.0	11.9
Highway.....	\$ 242	15,272	22,934	1,281	11	26	1,244	55.9	4.8
Not elsewhere classified.....	\$ 124	3,145	5,840	358	(1)	7	345	46,903	8.0
Communication.....	\$ 115	316,119	606,534	1,647	14	17	1,616	137,005	.2
Telephone (wire and radio).....	\$ 93	315,360	605,062	1,646	14	17	1,615	137,003	.2
Radio broadcasting and television.....	\$ 22	769	1,472	1	0	0	1	.7	(*)
Transportation.....	\$ 942	134,227	312,791	4,867	47	84	4,736	481,839	3.4
Streetcar.....	\$ 23	17,825	41,031	635	4	5	626	41,820	1.0
Bus.....	\$ 158	22,227	51,418	682	(3)	30	647	80,411	1.3
Both streetcar and bus.....	\$ 54	68,067	163,170	1,896	19	32	1,845	206,335	1.6
Trucking and hauling.....	\$ 586	14,974	33,069	1,150	13	13	1,124	107,256	3.2
Warehousing and storage.....	\$ 67	2,019	4,028	209	2	2	205	14,785	3.7
Pipe lines (except natural gas).....	\$ 11	1,405	2,962	37	0	1	36	51.9	.3
Not elsewhere classified.....	\$ 43	7,710	17,114	258	4	1	253	30,335	1.8
Heat, light, and power.....	\$ 368	206,855	415,183	4,813	82	91	4,640	714,523	1.7
Electric light and power.....	\$ 271	177,426	356,453	3,973	72	83	3,818	628,512	1.8
Gas.....	\$ 97	29,429	58,731	840	10	8	822	86,011	1.5
Waterworks.....	\$ 180	3,821	7,097	141	1	0	140	8,344	1.2

Waterworks.....	180	3,821	7,097	58,451	840	10	8	822	86,011	14.3	1.8
Personal services.....	4,665	100,200	347,740	3,025	7	0	84	2,934	209,085	10.2	1.5
Dry cleaning.....	745	18,417	39,869	732	1	0	9	217	22,032	6.7	0.8
Laundries.....	989	46,085	99,956	732	1	0	45	686	81,985	7.3	0.8
Laundry and dry cleaning combined.....	452	40,092	99,518	585	2	0	19	564	50,216	5.9	0.5
Amusements and related services.....	551	10,834	16,161	168	2	0	1	165	13,094	10.4	0.9
Hotels, and eating and drinking places.....	1,345	33,714	69,211	1,079	2	2	10	1,067	36,091	15.6	0.5
Medical and other professional services.....	330	8,022	16,545	216	0	0	0	216	3,298	13.1	0.2
Miscellaneous personal services.....	253	3,126	6,485	19	0	0	0	19	354	2.9	0.1
Business services.....	2,803	103,702	206,427	1,072	4	0	15	1,053	53,352	6.2	0.3
Banks and other financial agencies.....	1,382	66,468	112,139	254	2	0	4	248	21,489	2.3	0.2
Insurance.....	343	25,300	49,387	146	1	0	1	144	7,759	3.0	0.2
Real estate.....	531	10,467	23,107	320	1	0	5	314	12,662	13.8	0.5
Miscellaneous business services.....	547	11,467	21,794	352	0	0	5	347	11,442	16.2	0.5
Educational services.....	81	2,838	4,751	78	0	0	0	78	1,256	16.4	0.3
Trade.....	12,177	298,886	576,376	8,129	38	(5)	158	7,933	522,465	14.5	1.0
Wholesale distributors.....	2,578	70,509	149,741	2,670	19	(4)	59	2,592	228,195	17.8	1.5
Retail, general merchandise.....	506	61,826	125,436	862	7	0	5	850	59,595	6.9	0.5
Retail, food.....	3,967	40,069	94,799	1,514	1	0	23	1,490	48,857	16.0	0.5
Retail, automobiles.....	1,011	19,763	45,888	755	2	0	17	736	37,795	16.5	0.8
Filling stations.....	478	6,371	14,714	230	3	0	3	224	23,695	15.6	1.6
Retail, apparel and accessories.....	725	18,226	34,642	149	0	0	0	149	1,641	4.3	0.9
Miscellaneous retail stores.....	2,031	36,003	75,902	1,274	2	(1)	35	1,237	69,708	16.9	0.9
Wholesale and retail trade combined.....	581	15,519	35,554	675	4		16	655	52,979	19.0	1.5

478085-42-1

¹ Figures in parentheses show the number of permanent total disability cases included.
² The frequency rate is the average number of disabling injuries for each million employee-hours worked. The severity rate is the average number of days lost for each thousand employee-hours worked. The standard time-loss ratings for fatalities and permanent disabilities are given in Method of Compiling Industrial Injury Rates, approved by the American Standards Association, 1937.

³ Weighted by employment for manufacturing industries as shown in the Census of Manufactures, 1939, and computed for 1941 by means of Bureau of Labor Statistics indexes of employment, and for nonmanufacturing industries by Bureau of Labor Statistics employment data.

⁴ Included in group totals, but not available for publication separately.

⁵ Tabulated by company instead of establishment.

⁶ Less than a tenth.

The telephone industry had a frequency rate of only 2.7. No adequate data are available for the large industry of communication by telegraph, in which injuries to messengers present an important accident hazard.

The rate of 26.8 for the transportation group (exclusive of railroad and boat transportation) is again a weighted rate, taking into account the uneven representation of the individual component industries. The integrated operation of both streetcars and buses, for some unknown reason, has a lower frequency rate (11.6) than either streetcar (15.5) or bus transportation (13.3) alone. Warehousing and storage had by far the highest rate, with an average of 51.9 injuries per million hours, and trucking and hauling followed with a rate of 34.8.

In the heat, light, and power group, the frequency rate of 14.3 for the gas industry exceeded that for the electric light and power utility (11.1). Waterworks, however, exceeded both, with a rate of 19.9.

None of the frequency rates for the industries shown in the personal and business services group were very high. The highest rate (15.6) in the first group was experienced by hotels and eating and drinking places. The highest rate in the second group (13.8) was for real estate establishments. It is interesting to note, however, that the real estate business appears to be nearly as hazardous to employees as the operation of hotels, restaurants, and similar establishments.

Another interesting point, often overlooked, is that work in educational institutions is quite hazardous to employees; more so, for instance, than the operation of streetcars and buses. The respective frequency rates for these three types of industries were 16.4, 15.5, and 13.3.

In the trade group, the combination activity of wholesale and retail had a higher frequency rate (19.0) than either of the two individually, with 17.8 for wholesale, and rates varying from 4.3 for apparel and accessory stores to 16.5 for automobile retail and 16.0 for food stores. Filling stations experienced a frequency rate of 15.6.

Changes in Exposure, Injuries, and Injury Rates

As a general rule, the number of disabling injuries during 1941 increased much more than did the exposure of employees, whether measured in terms of employment or of employee-hours worked. The industries in which disabling injuries decreased while the exposure increased, or in which disabling injuries increased by a smaller percentage than did exposure, are very few, as apparent from table 3.

In 21,422 identical manufacturing establishments reporting for both 1941 and 1940, employment increased 21 percent, total employee-hours worked 28 percent, and the number of disabling injuries 46 percent. As a result, the weighted frequency rate went up 14 percent over that for 1940. The relationship of an increase in injuries about twice as large as the increase in employment was found in many of the industries of the manufacturing group.

In decided contrast with its 1940 experience, the explosives industry showed a pronounced decrease in injuries although both employment and employee-hours worked rose substantially. In 1940, increases of 29 percent in employment and 32 percent in total hours worked were coupled with an increase of 297 percent in injuries. As a consequence of this sharp reversal, the frequency rate for 1941 was 59 percent lower than the corresponding rate for 1940.

Petroleum refining establishments experienced a slight reduction, 2 percent, in the frequency rate, with injuries increasing 7 percent against an increase of 8 percent in exposure hours and of 4 percent in employment. In iron and steel production, however, injuries increased 39 percent, with increases in employment and exposure hours of 23 and 25 percent. In forgings, the injury increase was still more marked, going up 119 percent, against increases of 56 percent in hours and 40 percent in employment. In foundries, the injury increase was about twice that in employment or exposure hours. The same was true in an even larger measure in the leather and boots and shoes industries, and again in planing mills.

In the machinery group, the establishments producing metalworking machinery and those producing electrical equipment experienced proportionate rises in injuries much greater than their corresponding rises in employment and hours worked. In the manufacture of rubber tires, injuries increased twice as rapidly as exposure hours, and three times as rapidly as employment. In shipbuilding injuries the relative rise was over 50 percent greater than the rise in employment and 37 percent greater than the rise in exposure hours. In the production of aircraft, however, this general trend was reversed, with the increase in injuries somewhat below the increase in employment, and considerably below that in exposure hours. But in the production of motor vehicles and railroad equipment, the general trend again is evident.

In the nonmanufacturing industries, the accident-frequency rate of the construction group as a whole showed a slight downward change—6 percent. This change was due largely to the experience of highway construction, in which a decrease of 11 percent in employment and 4 percent in exposure hours resulted in a 25-percent reduction in injuries. In building construction the increase in injuries was about the same as the change in employment (32 and 33 percent), but was below the increase of 43 percent in hours. On the other hand, on heavy engineering projects, the increase in injuries, 46 percent, considerably exceeded those in employment and exposure hours, 21 and 32 percent, respectively.

A comment is in order concerning the changes in the frequency rates of the personal services, business services, and trade groups. In each instance, the change in the frequency rate for the entire group appears to be out of line with the changes shown in exposure and injuries. Thus, the 2,558 personal-service establishments covered in the survey had an increase of 32 percent in the composite frequency rate, with an increase in injuries of only 11 percent and increases of 15 and 16 percent in employment and exposure hours. The reason for this apparent discrepancy is that the frequency rate change was computed from weighted rates, in which the experiences of individual industries composing the group were weighted on the basis of employment.

The same was true for business services, in which the frequency rate is shown as falling 1 percent, whereas for the 909 reporting establishments, injuries increased 16 percent, and employment and exposure hours went up only 2 and 3 percent, respectively. In the trade group, a 1-percent drop in the weighted frequency rate was coupled with an increase of 2 percent in employment, of 3 percent in exposure hours, and of 4 percent in disabling injuries. In both of

these groups, the weighting (according to employment) of individual industries with dissimilar experiences permits a more adequate measure of the change in the frequency rate for the composite group.

TABLE 3.—Changes in Exposure, Disabling Injuries, and Injury Rates, for 31,153 Identical Establishments, 1940 to 1941

Industry	Number of establishments	Percent of change in—					
		Em- ploy- ees	Em- ployee- hours worked	Dis- abling in- juries	Total time lost	Fre- quency rate	Sever- ity rate
<i>Manufacturing</i>							
Total, manufacturing	21,422	+21	+28	+46	+34	+14	+7
Chemical products	1,628	+13	+15	+17	-21	+1	-32
Druggist preparations	234	+15	+16	+48	-28	+28	-38
Explosives	(2)	(2)	(2)	(2)	(2)	-59	-91
Fertilizers	341	+13	+14	+17	+21	+2	+6
Paints and varnishes	353	+11	+12	+27	+13	+13	+1
Petroleum refining	169	+4	+8	+7	+26	-2	+16
Rayon and allied products	26	+11	+12	-6	+41	-16	+27
Soap	81	+10	+13	+32	+17	+17	+3
Not elsewhere classified	(2)	+16	+18	+34	+43	+14	+21
Food products	2,568	+8	+10	+23	+3	+11	-16
Baking	638	+3	+4	+18	-6	+13	-9
Canning and preserving	399	+14	+25	+30	+39	+4	+12
Confectionery	202	+6	+8	+56	+78	+45	+67
Flour, feed, and other grain-mill products	529	+6	+7	+26	+8	+18	+1
Slaughtering and meat packing	212	+10	+9	+22	-(2)	+12	-9
Sugar refining	71	+3	+10	+4	+36	-6	+24
Not elsewhere classified	517	+10	+10	+16	-52	+5	-57
Iron and steel and their products	2,754	+26	+31	+64	+43	+25	+8
Iron and steel	312	+23	+25	+39	+31	+11	+6
Cutlery and edge tools	90	+15	+24	+13	-24	-9	-39
Enameling and galvanizing	69	+21	+30	+57	+18	+21	-9
Fabricated structural steel	261	+41	+45	+80	+48	+24	+2
Forgings	89	+40	+56	+119	+178	+40	+78
Foundries	541	+40	+52	+98	+123	+30	+46
Hardware	163	+17	+25	+57	+77	+26	+42
Ornamental metalwork	100	+18	+20	+40	+28	+17	+7
Plumbers' supplies	80	+19	+27	+47	+48	+15	+16
Stamped and pressed metal products	263	+24	+29	+58	+7	+22	-17
Steam fittings and apparatus	178	+25	+35	+79	+5	+32	-22
Stoves and furnaces, not electric	173	+14	+18	+50	+36	+27	+15
Tinware	67	+31	+36	+83	+51	+34	+11
Tools, except edge tools	109	+35	+50	+88	-11	+26	-41
Wire and wire products	111	+20	+22	+28	+41	+4	+14
Not elsewhere classified	148	+62	+80	+86	+20	+3	-33
Leather and its products	571	+11	+17	+52	+48	+38	+53
Leather	139	+13	+18	+52	+54	+29	+30
Boots and shoes	359	+10	+16	+44	+12	+24	-3
Not elsewhere classified	73	+20	+24	+151	+320	+103	+237
Lumber, lumber products, and furniture	3,199	+14	+20	+31	+24	+8	+17
Logging	240	+(2)	+10	+2	-1	-8	-10
Planing mills	834	+20	+25	+50	+32	+20	+5
Sawmills	649	+12	+21	+25	+77	+3	+46
Furniture, except metal	841	+12	+16	+42	+1	+22	-12
Furniture, metal	58	+28	+27	+54	-10	+21	-29
Partitions, shelving, and store fixtures	100	+53	+59	+85	+141	+16	+51
Morticians' supplies	33	+6	+11	+10	-35	-1	-41
Wooden containers	263	+14	+16	+34	+22	+16	+5
Not elsewhere classified	181	+14	+18	+46	+12	+24	-5
Machinery (not transportation)	2,345	+34	+45	+67	+70	+16	+21
Agricultural machinery and tractors	139	+17	+19	+37	+48	+15	+24
Construction and mining machinery	226	+31	+45	+68	+38	+16	-5
Electrical equipment and supplies	(2)	(2)	(2)	(2)	(2)	+10	+10
Food-products machinery	116	+7	+15	+46	+80	+27	+57
Metalworking machinery	(2)	(2)	(2)	(2)	(2)	+8	+42
Textile machinery	130	+25	+38	+60	+32	+23	-4
Special industry machinery, not elsewhere classified	316	+27	+37	+64	+65	+19	+20
General industrial machinery	600	+32	+46	+87	+81	+29	+24
Machinery, not elsewhere classified	93	+16	+28	+38	+99	+8	+56
Repair shops	153	+20	+22	+32	+143	+8	+98

See footnotes at end of table.

TABLE 3.—Changes in Exposure, Disabling Injuries, and Injury Rates, for 31,153 Identical Establishments, 1940 to 1941—Continued

Industry	Number of establishments	Percent of change in—					
		Em- ploy- ees	Em- ployee- hours worked	Dis- abling in- juries	Total time lost	Fre- quency rate	Sever- ity rate
Manufacturing—Continued							
Paper and allied products.....	764	+10	+15	+22	+25	+7	+17
Pulp.....	22	+5	+10	-1	+82	-9	+6
Paper.....	162	+9	+15	+19	+22	+4	+6
Paper and pulp (integrated).....	61	+6	+11	+10	+8	-1	-3
Folding boxes.....	94	+12	+15	+34	+7	+16	-8
Set-up boxes.....	223	+16	+17	+35	-10	+15	-23
Corrugated boxes.....	61	+9	+15	+87	+19	+62	+3
Fiber boxes.....	17	+33	+43	+80	+240	+26	+141
Not elsewhere classified.....	124	+14	+21	+27	+94	+5	+60
Printing and publishing.....	2,359	+4	+4	+14	+41	+9	+35
Book and job.....	1,500	+5	+6	+22	+80	+15	+70
News and periodical.....	741	+3	+2	+5	+7	+3	+5
Bookbinding.....	28	+16	+21	+20	+18	-1	-3
Rubber and its products.....	115	+20	+27	+62	+67	+29	+30
Rubber tires.....	31	+17	+26	+54	+72	+22	+37
Rubber boots and shoes.....	15	+20	+28	+44	+10	+12	-14
Not elsewhere classified.....	69	+26	+30	+85	+91	+42	+46
Stone, clay, and glass products.....	1,159	+16	+19	+30	+12	+13	+5
Brick, tile, and terra cotta.....	449	+15	+20	+32	-13	+10	-28
Cement.....	131	+24	+15	+55	+42	+35	+24
Glass.....	152	+14	+19	+14	-21	-5	-34
Pottery.....	78	+17	+20	+31	-19	+9	-33
Concrete, gypsum, and plaster products.....	172	+10	+16	+46	+38	+25	+19
Cut stone and cut-stone products.....	102	+1	+4	+20	+160	+15	+150
Not elsewhere classified.....	75	+22	+26	+56	+170	+24	+115
Textiles and their products.....	2,838	+12	+20	+39	+39	+15	+16
Carpets and rugs.....	51	+13	+20	+21	+36	+ ⁽³⁾	+13
Clothing—men's.....	499	+9	+17	+20	+24	+3	+6
Clothing—women's.....	476	+5	+6	-5	+37	-11	+28
Cotton goods.....	424	+15	+24	+44	+27	+16	+3
Dyeing and finishing.....	159	+10	+15	+19	+22	+4	+7
Knit goods.....	512	+4	+9	+15	+9	+6	0
Silk and rayon products, not elsewhere classified.....	152	+4	+7	+21	-8	+13	-15
Woolen goods.....	300	+24	+36	+65	+102	+21	+49
Not elsewhere classified.....	255	+14	+22	+57	+60	+29	+30
Transportation equipment.....	390	+36	+49	+69	+77	+16	+21
Motor vehicles.....	149	+6	+14	+22	+22	+7	+7
Shipbuilding.....	(2)	(2)	(2)	(2)	(2)	+20	-2
Railroad equipment.....	(2)	(2)	(2)	(2)	(2)	+23	+84
Aircraft.....	(2)	(2)	(2)	(2)	(2)	-20	+3
Motor-vehicle parts.....	63	+32	+40	+63	+17	+16	-17
Not elsewhere classified.....	58	+16	+24	+34	+86	+9	+51
Miscellaneous manufacturing ⁴	732	+15	+19	+45	+42	+22	+2
Tobacco products.....	186	+12	+14	+9	+76	-5	+52
Radios and phonographs.....	44	+16	+18	+30	+178	+10	+137
Smelting and refining (nonferrous).....	(2)	(2)	(2)	(2)	(2)	+35	+19
Nonferrous metal products.....	(2)	(2)	(2)	(2)	(2)	+23	-14
Coke ovens.....	38	+13	+13	-1	+29	-12	+15
Not elsewhere classified.....	190	+25	+29	+54	+9	+19	-16
Nonmanufacturing							
Construction ⁴	\$1,118	+20	+28	+21	+20	-6	-5
Building.....	\$864	+33	+43	+32	+9	-8	-24
Heavy engineering.....	\$112	+21	+32	+46	+61	+10	+22
Highway.....	\$126	-11	-4	-25	-33	-22	-31
Communication ⁴	\$82	+12	+16	+27	+48	+9	+29
Telephone (wire and radio).....	\$68	+12	+16	+26	+48	+9	+29
Radio broadcasting and television.....	\$12	+60	+59	0	-86	-37	-100
Transportation ⁴	\$410	+3	+2	+5	+17	+3	+15
Streetcar.....	\$17	-1	-2	-3	-24	-1	-22
Bus.....	\$72	+9	+1	+2	+31	+1	+31
Both streetcar and bus.....	\$32	+1	+3	+1	-8	-2	-11
Trucking and hauling.....	\$242	+11	+13	+30	+319	+15	+275
Warehousing and storage.....	\$26	+10	+11	+156	+1,896	+132	+1,685

See footnotes at end of table.

TABLE 3.—Changes in Exposure, Disabling Injuries, and Injury Rates, for 31,153 Identical Establishments, 1940 to 1941—Continued

Industry	Number of establishments	Percent of change in—					
		Employees	Employee-hours worked	Disabling injuries	Total time lost	Frequency rate	Severity rate
Nonmanufacturing—Continued							
Heat, light, and power ⁴	6 342	+2	+2	+13	-12	+11	-13
Electric light and power	5 255	+1	+2	+12	-11	+10	-12
Gas	5 78	+3	+1	+21	-12	+19	-14
Waterworks	5 91	+1	+ ⁽²⁾	+2	-36	+1	-36
Personal services	2,558	+15	+16	+11	+61	¹ +32	¹ +152
Dry cleaning	545	+12	+12	+37	+69	+23	+51
Laundries	769	+8	+9	-3	+21	-12	+10
Laundry and dry cleaning combined	365	+30	+30	+5	+93	-19	+48
Amusements and related services	200	+3	+9	+36	+815	+25	+757
Hotels, and eating and drinking places	517	+11	+17	+29	+197	+11	+156
Medical and other professional services	61	+3	+4	+153	+157	+144	+138
Miscellaneous personal services	101	+ ⁽³⁾	-2	0	+312	+1	+250
Business services	909	+2	+3	+16	+48	¹ -1	¹ -19
Banks and other financial agencies	453	+2	+2	+24	+726	+22	+640
Insurance	129	+4	+3	+7	-95	+4	-96
Real estate	149	+4	+2	-6	+3	-7	0
Miscellaneous business services	178	+5	+18	+33	-34	+13	-43
Educational services	48	+ ⁽³⁾	+ ⁽³⁾	+17	+33	+16	+33
Trade	4,167	+2	+3	+4	-4	¹ -1	¹ -3
Wholesale distributors	1,238	+9	+9	+3	+18	-6	+8
Retail, general merchandise	219	-9	-3	- ⁽³⁾	-23	+3	-21
Retail, food	600	+2	+1	-14	-46	-14	-47
Retail, automobiles	390	+5	+4	+5	+222	+2	+209
Filling stations	339	+9	+6	+14	+527	+8	+492
Retail, apparel and accessories	300	+16	+9	+53	+22	+40	+25
Miscellaneous retail stores	853	+12	+14	+26	-2	+11	-14
Wholesale and retail trade combined	228	-3	-2	+4	-24	+6	-22

¹ Weighted by employment for manufacturing industries as shown in the Census of Manufactures, 1939, and computed for 1940 and 1941 by means of Bureau of Labor Statistics indexes of employment, and for nonmanufacturing industries by Bureau of Labor Statistics employment data.

² Number of establishments and amount of change not available for publication.

³ Less than 0.5.

⁴ Totals include figures for industries not shown separately.

⁵ Tabulated by company instead of establishment.

Disability Estimates for Manufacturing Industries

Where the number of reporting manufacturing establishments and their employees in any one industry was sufficiently large to warrant the assumption that their injury experience fairly adequately reflected that of the entire industry, estimates were made for the injury experience of the industry. With a few exceptions—in which the number of employees reported was in itself large—the sample used represented at least 40 percent of the total employment in the industry. There is good reason to believe, however, that these estimates are conservative. The important points of table 4 have been referred to in the summary.

TABLE 4.—Estimates of Disabilities, by Extent, for Manufacturing Industries, 1941

Industry	All reporting establishments					Estimates for entire industry				
	Number of establishments	Number of employees (thousands)	Employee-hours (millions)	Number of disabling injuries	Total days lost (thousands)	All disabling injuries	Death and permanent total disability	Permanent partial disability	Temporary total disability	Total days lost (thousands)
Chemical products ¹	1,882	372	740	8,828	1,371	13,500	160	700	12,640	2,005
Druggist preparations	273	34	69	625	35	1,100		50	1,050	60
Explosives	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
Fertilizers	367	19	36	1,001	149	1,200	20	30	1,150	177
Paints and varnishes	399	25	50	748	76	1,300	5	40	1,255	131
Petroleum refining	210	90	178	1,766	409	1,800	40	100	1,660	413
Rayon and allied products	30	52	104	1,000	116	1,100	10	50	1,040	129
Soap	88	22	45	486	67	500		60	440	72
Food products ¹	3,218	361	723	18,020	1,346	47,300	155	1,920	45,225	3,372
Confectionery	254	35	70	1,122	61	2,300		60	2,240	125
Flour, feed, and other grain-mill products	604	34	72	1,560	142	2,800	20	90	2,690	256
Slaughtering and meat packing	253	123	251	7,746	597	12,700	25	770	11,905	980
Sugar refining	77	16	35	977	120	2,000	5	170	1,825	243
Iron and steel and their products ¹	3,295	1,124	2,368	47,976	4,994	74,300	410	4,400	69,490	7,048
Iron and steel	335	580	1,198	12,246	2,172	12,700	190	1,040	11,470	2,259
Cutlery and edge tools	103	13	27	554	30	1,200		50	1,150	66
Forgings	101	21	49	2,181	136	3,300	10	150	3,140	203
Foundries	633	129	277	13,008	893	21,600	95	640	20,865	1,483
Hardware	190	39	83	1,615	203	2,200	20	220	1,960	274
Plumbers' supplies	94	37	78	1,381	119	1,400	5	100	1,295	119
Stamped and enameled ware	404	55	115	3,322	311	5,400	5	530	4,865	503
Steam fittings and apparatus	223	34	75	2,433	150	6,300	15	270	6,015	386
Stoves and furnaces, not electric	237	45	92	2,729	227	4,300	20	210	4,070	361
Structural and ornamental metalwork	432	51	107	3,373	316	5,200	30	290	4,880	484
Tinware	79	23	47	996	90	2,100		220	1,880	188
Tools, except edge tools	130	20	46	1,136	67	1,900		110	1,790	112
Leather and its products ¹	679	166	328	4,063	286	8,300	30	360	7,910	610
Leather	164	36	75	2,005	169	3,200	15	130	3,055	269
Boots and shoes	415	121	236	1,793	88	3,700	5	140	3,555	181
Lumber, lumber products, and furniture ¹	4,007	345	693	26,348	2,709	66,800	425	3,430	62,945	7,244
Logging	281	22	40	3,897	575	4,600	70	110	4,420	684
Planing mills	999	63	132	5,167	424	8,300	25	450	7,825	679
Furniture	1,129	131	267	5,865	450	9,600	20	720	8,860	734
Partitions, shelving, and store fixtures	125	8	17	370	36	800		100	700	80
Machinery (not transportation) ¹	3,000	926	2,059	34,570	2,804	56,600	155	3,450	52,995	4,441
Agricultural machinery and tractors	164	72	148	3,800	334	5,000	10	440	4,550	438
Construction and mining machinery	274	59	133	3,913	299	4,400	25	170	4,205	338
Electrical equipment and supplies	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
Food-products machinery	133	18	40	962	88	1,600	5	120	1,475	145
Metalworking machinery	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
Textile machinery	148	27	61	954	71	1,200	5	60	1,135	88
Special industry machinery, not elsewhere classified	371	60	136	3,160	333	3,200	10	210	2,980	333
General industrial machinery	799	193	434	9,705	647	18,400	50	960	17,390	1,229
Paper and allied products ¹	1,578	266	563	13,073	1,289	16,700	75	780	15,845	1,635
Pulp	50	14	30	868	115	2,100	15	110	1,975	275
Paper, or paper and pulp	426	139	299	7,671	846	8,300	50	370	7,880	913
Paper boxes	723	58	121	2,716	174	4,200	5	210	3,985	271
Printing and publishing ¹	2,799	166	330	2,596	242	7,500	40	360	7,100	685
Rubber and its products ¹	204	90	182	2,943	235	5,900	25	230	5,645	462
Rubber tires	44	41	82	1,061	123	2,000	15	70	1,915	228
Stone, clay, and glass products ¹	1,512	205	405	9,544	840	20,600	150	660	19,790	1,896
Brick, tile, and terra cotta	541	45	87	3,324	188	5,600	20	100	5,480	317
Cement	140	24	49	361	147	500	15	60	425	185
Glass	201	74	144	2,505	149	3,800	5	130	3,665	226
Pottery	100	25	49	877	75	1,700	15	30	1,655	144

See footnotes at end of table.

TABLE 4.—Estimates of Disabilities, by Extent, for Manufacturing Industries, 1941—Con.

Industry	All reporting establishments					Estimates for entire industry				
	Number of establishments	Number of employees (thousands)	Employee-hours (millions)	Number of disabling injuries	Total days lost (thousands)	All disabling injuries	Death and permanent total disability	Permanent partial disability	Temporary total disability	Total days lost (thousands)
Textiles and their products ¹	3,742	898	1,740	21,189	1,447	45,200	90	1,700	43,410	2,986
Carpets and rugs.....	78	37	72	929	152	1,200	10	90	1,100	198
Cotton goods.....	494	276	559	8,510	512	15,800	20	600	15,180	953
Dyeing and finishing.....	206	40	80	1,413	126	2,900	10	130	2,760	258
Knit goods.....	661	134	249	1,630	72	2,800	5	60	2,735	125
Silk and rayon products, not elsewhere classified.....	214	53	96	1,094	46	2,300	5	00	2,235	98
Woolen goods.....	358	129	258	4,003	318	6,000	15	280	5,705	481
Transportation equipment ¹	652	912	1,895	28,208	3,332	37,500	215	2,730	34,555	4,420
Motor vehicles and parts.....	263	405	816	8,940	918	12,800	45	1,060	11,695	1,313
Shipbuilding and boatbuilding.....	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
Railroad equipment.....	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
Aircraft.....	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
Miscellaneous manufacturing ¹	1,146	261	532	7,161	875	28,300	100	2,260	25,940	2,836
Tobacco products.....	221	51	95	594	43	1,100	-----	50	1,050	78
Radios and phonographs.....	58	44	85	525	117	900	-----	110	790	189
Smelting and refining (non-ferrous).....	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
Coke ovens.....	50	15	33	141	68	300	15	30	255	148

¹ Includes data for industries not shown separately because of insufficient coverage upon which to base industry estimates.

² Included in group totals but not available for publication separately.

Parts of Body Permanently Impaired

The distribution of 12,612 injuries reported for 1941 in the manufacturing industries was exactly the same as that for 8,509 similar injuries reported for 1940, indicating that the general distribution of permanent impairments to body parts remains fairly stable for the entire working population. There were, however, differences for individual industries. For example, in 1941 about 62 percent of all impairments in the explosives industry were to hands or fingers, as compared with only 25 in 1940. In the fertilizer industry, impairments to legs were 18 percent in 1941, against 10 in 1940. In sugar refining, there were only 15 foot or toe impairments in 1941 against 22 in 1940, and eye injuries were only 4 percent as compared with 14 the year before. Hand or finger impairments, however, were 62 percent of the total, instead of 48 percent.

41—Con.

Industry

Temporary total disability	Total days lost (thousands)
3,410	2,966
1,100	198
1,180	953
2,760	258
2,735	125
2,235	98
1,705	481
1,555	4,420
1,695	1,313
(2)	(2)
(2)	(2)
(2)	(2)
1,940	2,836
1,050	78
790	189
(2)	(2)
255	148

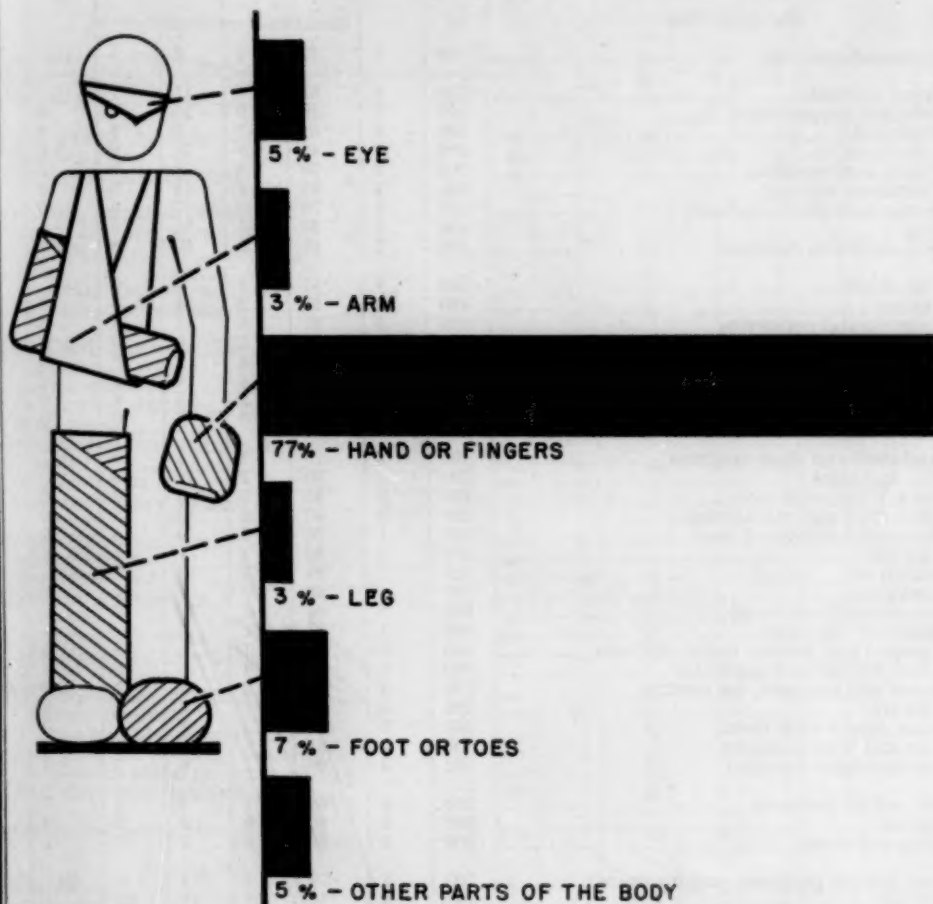
ich to base

manu-
similar
tribution
for the
ces for
t of all
ers, as
mpair-
a sugar
against
with 14
ere 62

CHART 2

DISTRIBUTION OF ALL REPORTED INJURIES RESULTING IN PERMANENT PARTIAL DISABILITY

IN MANUFACTURING
ACCORDING TO THE PART OF THE BODY AFFECTED
1941



UNITED STATES DEPARTMENT OF LABOR
BUREAU OF LABOR STATISTICS

TABLE 5.—Distribution of All Reported Injuries Resulting in Permanent Partial Disability, According to Part of Body Affected, by Industry, 1941

Industry	Total	Percent of permanent partial disability cases involving the loss, or loss of use, of—						Other
		An arm	A hand or fingers	A leg	A foot or toes	An eye	One or both ears (hearing)	
<i>Manufacturing</i>								
Total, manufacturing.....	100	3	77	3	7	5	(1)	
Chemical products.....	100	6	61	5	11	7	(1)	10
Druggist preparations.....	100	7	80	0	10	3	0	6
Explosives.....	100	8	62	11	0	8	0	11
Fertilizers.....	100	9	45	18	14	9	0	5
Paints and varnishes.....	100	8	76	8	8	0	0	0
Petroleum refining.....	100	4	65	4	14	9	0	4
Rayon and allied products.....	100	5	79	0	7	9	0	0
Soap.....	100	7	65	5	16	2	0	5
Not elsewhere classified.....	100	5	51	3	10	8	1	22
Food products.....	100	4	82	3	5	2	(1)	4
Baking.....	100	4	83	2	4	1	0	6
Canning and preserving.....	100	5	81	5	3	3	3	0
Confectionery.....	100	6	82	3	6	0	0	3
Flour, feed, and other grain-mill products.....	100	4	82	4	2	8	0	0
Slaughtering and meat packing.....	100	4	83	4	4	2	0	3
Sugar refining.....	100	6	62	2	15	4	0	11
Not elsewhere classified.....	100	5	87	0	3	0	0	5
Iron and steel and their products.....	100	1	79	2	8	5	(1)	5
Iron and steel.....	100	1	80	2	9	5	0	3
Cutlery and edge tools.....	100	5	85	0	0	0	0	10
Enameling and galvanizing.....	100	0	92	3	0	3	0	2
Fabricated structural steel.....	100	1	76	3	9	6	0	5
Forgings.....	100	1	85	1	1	4	0	8
Foundries.....	100	1	69	3	13	9	(1)	5
Hardware.....	100	1	89	0	4	4	0	2
Ornamental metalwork.....	100	2	64	2	12	10	0	10
Plumbers' supplies.....	100	1	87	1	5	2	1	3
Stamped and pressed metal products.....	100	0	93	1	1	3	0	2
Steam fittings and apparatus.....	100	0	60	4	13	6	0	17
Stoves and furnaces, not electric.....	100	3	84	2	2	7	0	2
Tinware.....	100	2	91	1	3	0	0	3
Tools, except edge tools.....	100	0	87	3	3	6	0	1
Wire and wire products.....	100	0	81	4	9	5	0	1
Not elsewhere classified.....	100	3	69	1	9	2	0	16
Leather and its products.....	100	4	88	1	2	1	1	3
Leather.....	100	5	89	0	2	2	0	2
Boots and shoes.....	100	3	87	3	3	0	1	3
Lumber, lumber products, and furniture.....	100	4	79	4	4	5	(1)	4
Logging.....	100	5	44	15	14	12	1	9
Planing mills.....	100	5	85	1	2	5	(1)	2
Sawmills.....	100	9	64	9	8	6	0	4
Furniture, except metal.....	100	1	91	1	1	3	0	3
Furniture, metal.....	100	0	91	0	1	4	0	4
Partitions, shelving, and store fixtures.....	100	2	93	0	5	0	0	0
Wooden containers.....	100	1	89	1	5	1	0	3
Not elsewhere classified.....	100	3	81	5	4	3	0	4
Machinery (not transportation).....	100	2	79	2	8	5	(1)	4
Agricultural machinery and tractors.....	100	(1)	88	1	5	3	0	3
Construction and mining machinery.....	100	2	74	1	10	9	1	7
Electrical equipment and supplies.....	100	2	85	1	4	5	0	3
Food-products machinery.....	100	3	62	1	3	6	0	25
Metalworking machinery.....	100	2	80	2	8	6	1	1
Textile machinery.....	100	5	79	2	5	9	0	0
Special industry machinery, not elsewhere classified.....	100	2	70	5	17	5	0	1
General industrial machinery.....	100	2	77	1	10	5	0	5
Machinery, not elsewhere classified.....	100	2	79	2	8	2	0	7
Paper and allied products.....	100	9	74	3	7	4	(1)	3
Pulp.....	100	9	64	2	7	18	0	0
Paper.....	100	8	70	3	9	5	(1)	5
Paper and pulp (integrated).....	100	13	66	6	10	4	0	1
Folding boxes.....	100	3	94	0	0	0	0	3
Set-up boxes.....	100	4	90	2	0	0	0	4
Corrugated boxes.....	100	10	82	0	6	2	0	0
Not elsewhere classified.....	100	8	80	3	3	1	0	5

¹ Less than half of 1 percent.

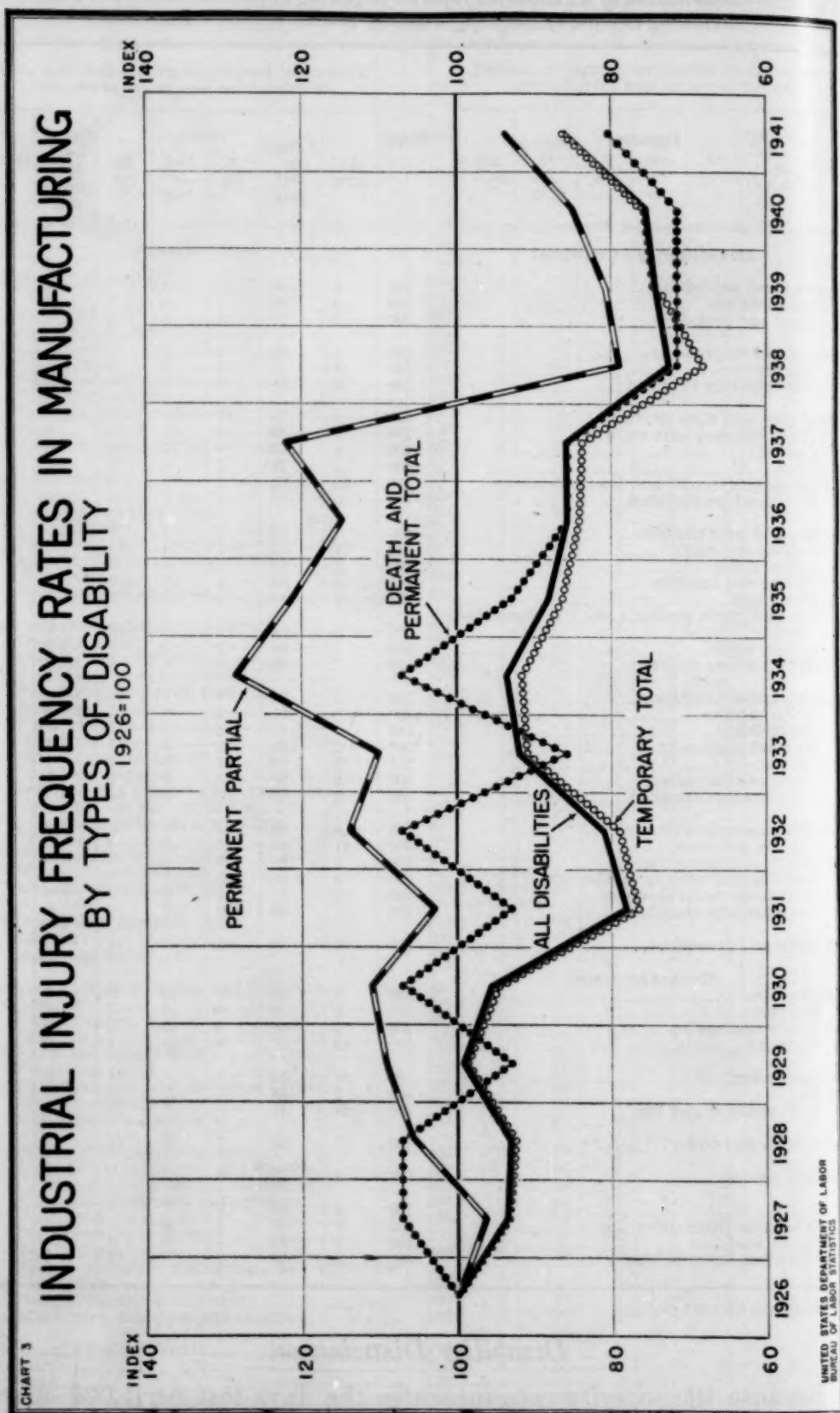
TABLE 5.—Distribution of All Reported Injuries Resulting in Permanent Partial Disability, According to Part of Body Affected, by Industry, 1941—Continued

Industry	Total	Percent of permanent partial disability cases involving the loss, or loss of use, of—						
		An arm	A hand or fingers	A leg	A foot or toes	An eye	One or both ears (hearing)	Other
Manufacturing—Continued								
Printing and publishing.....	100	3	84	3	4	1	0	5
Book and job.....	100	2	88	1	6	1	0	2
News and periodical.....	100	5	79	8	0	0	0	8
Rubber and its products.....	100	5	85	1	5	3	0	1
Rubber tires.....	100	11	77	3	3	6	0	0
Not elsewhere classified.....	100	0	91	0	7	1	0	1
Stone, clay, and glass products.....	100	6	71	3	8	7	(1)	5
Brick, tile, and terra cotta.....	100	8	68	2	10	10	0	2
Cement.....	100	4	65	9	13	9	0	0
Glass.....	100	4	78	0	6	8	0	4
Concrete, gypsum, and plaster products.....	100	13	65	2	7	2	2	9
Not elsewhere classified.....	100	0	76	5	5	5	0	9
Textiles and their products.....	100	7	82	2	4	3	(1)	2
Carpets and rugs.....	100	14	60	4	14	1	0	7
Cotton goods.....	100	6	83	2	3	4	1	1
Dyeing and finishing.....	100	6	66	2	13	5	0	8
Knit goods.....	100	3	85	3	3	6	0	0
Silk and rayon products, not elsewhere classified.....	100	0	84	4	4	4	0	4
Woolen goods.....	100	7	84	2	2	3	0	2
Not elsewhere classified.....	100	7	88	0	1	2	1	1
Transportation equipment.....	100	3	71	4	9	6	(1)	7
Motor vehicles.....	100	2	81	2	6	5	0	4
Shipbuilding.....	100	3	57	6	15	5	1	13
Railroad equipment.....	100	2	65	3	9	5	1	15
Aircraft.....	100	3	75	3	9	7	1	2
Motor-vehicle parts.....	100	2	90	0	0	6	0	2
Not elsewhere classified.....	100	5	55	10	15	10	0	5
Miscellaneous manufacturing.....	100	4	80	3	7	3	0	3
Tobacco products.....	100	11	85	0	0	4	0	0
Radios and phonographs.....	100	3	87	6	3	0	0	1
Smelting and refining (nonferrous).....	100	6	66	5	14	5	0	4
Nonferrous metal products.....	100	2	87	1	5	3	0	2
Not elsewhere classified.....	100	1	89	0	3	2	0	5
Ordnance and accessories.....	100	0	68	3	4	4	0	21
Nonmanufacturing								
Construction.....	100	5	55	6	14	6	1	13
Building.....	100	6	48	9	16	7	2	12
Heavy engineering.....	100	2	66	2	11	5	0	14
Highway.....	100	12	57	0	15	4	0	12
Transportation.....	100	11	52	5	11	14	0	7
Bus.....	100	3	58	3	23	10	0	3
Both streetcar and bus.....	100	25	41	6	3	16	0	9
Heat, light, and power.....	100	9	54	7	10	11	1	8
Personal services.....	100	7	72	7	7	2	0	5
Trade.....	100	4	69	4	7	8	0	8
Wholesale distributors.....	100	7	67	3	8	5	0	10
Retail, food.....	100	4	79	4	0	0	0	13
Miscellaneous retail stores.....	100	3	68	6	6	14	0	3

(1) Less than half of 1 percent.

Disability Distribution

Because the severity rate measures the days lost per 1,000 hours' exposure (i. e., employee-hours worked), but does not indicate the seriousness of injuries as such, table 6 was prepared to show the relative distribution of deaths, permanent impairments, and temporary



total disabilities. For permanent partial disabilities the average time charge per injury is shown, as is the average duration per temporary total disability. The time charge per death or permanent total disability, not shown on the table, is 6,000 days.

For the entire group of manufacturing industries, 0.5 percent of all injuries resulted in death, 5.7 percent in permanent partial impairments with an average time charge of 950 days, and 93.8 percent in temporary total disabilities lasting an average of 16 days each. In only a few industries did deaths exceed 1.0 percent: Explosives, 2.7 percent; fertilizer, 1.5 percent; petroleum refining, 2.3 percent; iron and steel, 1.5 percent; ornamental metalwork, 1.1 percent; logging, 1.5 percent; cement, 3.6 percent; pottery, 1.0 percent; and cut stone and cut-stone products, 1.9 percent. Among the nonmanufacturing industries, the percentage of fatalities was highest in heavy engineering, 2.1 percent. In the electric light and power utility, 1.8 percent of all disabling injuries resulted in death, and in the gas utility, 1.1 percent. The fatality percentage for filling stations was 1.3 percent, and for trucking and hauling, 1.1 percent.

TABLE 6.—Disability Distribution and Average Days Lost Per Disability, by Industry, 1941

[All reporting establishments]

Industry	Percent of injuries resulting in—			Average days lost per disability	
	Death and permanent total disability ¹	Permanent partial disability	Temporary total disability	Permanent partial disability	Temporary total disability
<i>Manufacturing</i>					
Total, manufacturing ¹	0.5	5.7	93.8	950	16
Chemical products ²	1.3	5.7	93.0	1,196	17
Druggist preparations.....	0	4.8	95.2	917	13
Explosives.....	2.7	10.9	86.4	1,275	21
Fertilizers.....	1.5	2.2	96.3	1,986	16
Paints and varnishes.....	.5	3.3	96.2	1,644	16
Petroleum refining.....	2.3	5.7	92.0	1,269	22
Rayon and allied products.....	.9	4.3	94.8	1,145	14
Soap.....	0	11.3	88.7	1,074	18
Not elsewhere classified.....	1.2	5.3	93.5	1,073	17
Food products ².....	.3	4.0	95.7	905	16
Baking.....	.3	5.2	94.5	958	16
Canning and preserving.....	.4	2.2	97.4	914	16
Confectionery.....	.1	2.8	97.1	1,235	16
Flour, feed, and other grain-mill products.....	.8	3.1	96.1	979	15
Slaughtering and meat packing.....	.2	6.1	93.7	881	13
Sugar refining.....	.3	8.4	91.3	1,060	16
Not elsewhere classified.....	.4	1.9	97.7	718	17
Iron and steel and their products ¹.....	.8	7.0	92.2	784	20
Iron and steel.....	1.5	8.2	90.3	785	27
Cutlery and edge tools.....	.2	3.8	96.0	781	13
Enameling and galvanizing.....	.1	7.2	92.7	786	18
Fabricated structural steel.....	.5	5.2	94.3	725	16
Forgings.....	.3	4.5	95.2	691	12
Foundries.....	.4	3.0	96.6	902	16
Hardware.....	.9	10.2	88.9	563	14
Ornamental metalwork.....	1.1	8.8	90.1	990	16
Plumbers' supplies.....	.5	7.2	92.3	598	14
Stamped and pressed metal products.....	.1	10.8	89.1	745	15
Steam fittings and apparatus.....	.2	4.3	95.5	821	15
Stoves and furnaces, not electric.....	.4	4.7	94.9	915	14
Tinware.....	0	10.6	89.4	729	14
Tools, except edge tools.....	.1	5.9	94.0	711	12
Wire and wire products.....	.2	7.3	92.5	775	15
Not elsewhere classified.....	.3	9.7	90.0	686	17

See footnotes at end of table.

TABLE 6.—Disability Distribution and Average Days Lost Per Disability, by Industry, 1941—Continued

Industry	Percent of injuries resulting in—			Average days lost per disability	
	Death and permanent total disability ¹	Permanent partial disability	Temporary total disability	Permanent partial disability	Temporary total disability
<i>Manufacturing—Continued</i>					
Leather and its products ²	0.2	4.2	95.6	825	13
Leather.....	.4	4.0	95.6	1,025	17
Boots and shoes.....	.1	3.8	96.1	768	13
Not elsewhere classified.....	.8	6.4	92.8	885	10
Lumber, lumber products, and furniture ².....	.5	5.7	93.8	1,035	16
Logging.....	1.5	2.3	96.2	1,560	21
Planing mills.....	.3	5.5	94.2	929	15
Sawmills.....	.8	4.5	94.7	1,363	18
Furniture, except metal.....	.2	7.7	92.1	735	13
Furniture, metal.....	0	7.0	93.0	542	12
Partitions, shelving, and store fixtures.....	0	11.9	88.1	694	17
Morticians' supplies.....	(³)	(³)	(³)	900	17
Wooden containers.....	.5	5.1	94.4	769	14
Not elsewhere classified.....	.3	6.6	93.1	983	14
Machinery (not transportation) ².....	.3	6.9	92.8	814	14
Agricultural machinery and tractors.....	.2	8.7	91.1	769	12
Construction and mining machinery.....	.5	3.8	95.7	856	12
Electrical equipment and supplies.....	.3	8.6	91.1	780	17
Food products machinery.....	.4	7.4	92.2	750	12
Metalworking machinery.....	.2	4.3	95.5	829	12
Textile machinery.....	.3	4.6	95.1	883	16
Special industry machinery, not elsewhere classified.....	.3	6.5	93.2	1,086	15
General industrial machinery.....	.3	5.2	94.5	759	12
Machinery, not elsewhere classified.....	.4	10.3	89.3	862	17
Repair shops.....	0	2.8	97.2	1,385	13
Paper and allied products ².....	.4	4.7	94.9	1,149	17
Pulp.....	.7	5.1	94.2	1,368	23
Paper.....	.5	4.5	95.0	1,201	18
Paper and pulp (integrated).....	.9	4.1	95.0	1,425	19
Folding boxes.....	.4	4.1	95.5	675	11
Set-up boxes.....	0	8.6	91.4	842	14
Corrugated boxes.....	0	4.1	95.9	1,081	14
Fiber boxes.....	(³)	(³)	(³)	917	13
Not elsewhere classified.....	.3	4.7	95.0	1,116	16
Printing and publishing ².....	.6	4.7	94.7	927	17
Book and job.....	.7	6.0	93.3	798	16
News and periodical.....	.5	3.2	96.3	1,130	19
Bookbinding.....	(³)	(³)	(³)	500	14
Rubber and its products ².....	.5	3.9	95.6	1,055	18
Rubber tires.....	.8	3.3	95.9	1,330	22
Rubber boots and shoes.....	.3	3.0	96.7	1,067	16
Not elsewhere classified.....	.1	4.6	95.3	807	15
Stone, clay, and glass products ².....	.8	3.8	95.4	1,018	16
Brick, tile, and terra cotta.....	.4	1.8	97.8	1,093	14
Cement.....	3.6	12.7	83.7	1,275	34
Glass.....	.1	3.6	96.3	1,067	15
Pottery.....	1.0	1.6	97.4	636	14
Concrete, gypsum, and plaster products.....	.7	3.8	95.5	1,137	16
Cut stone and cut-stone products.....	1.9	3.1	95.0	788	12
Not elsewhere classified.....	1.0	4.2	94.8	955	17
Textiles and their products ².....	.2	3.4	96.4	1,114	15
Carpets and rugs.....	.6	7.6	91.8	1,437	17
Clothing, men's.....	.2	1.5	98.3	1,211	13
Clothing, women's.....	0	4.2	95.8	1,632	14
Cotton goods.....	.1	3.8	96.1	1,016	15
Dyeing and finishing.....	.4	4.4	95.2	1,137	19
Knit goods.....	.2	2.0	97.8	811	14
Silk and rayon products, not elsewhere classified.....	.2	2.4	97.4	704	15
Woolen goods.....	.2	4.6	95.2	1,042	18
Not elsewhere classified.....	.2	4.6	95.2	925	13
Transportation equipment ².....	.5	7.7	91.8	923	17
Motor vehicles.....	.4	9.5	90.1	820	20
Shipbuilding.....	.6	5.1	94.3	1,107	18
Railroad equipment.....	.9	10.9	88.2	827	23
Aircraft.....	.7	8.0	91.3	995	11
Motor vehicle parts.....	.1	5.0	94.9	699	13
Boatbuilding.....	(³)	(³)	(³)	1,288	11
Not elsewhere classified.....	.5	4.8	94.7	1,383	16

See footnotes at end of table.

TABLE 6.—Disability Distribution and Average Days Lost Per Disability,
by Industry, 1941—Continued

Industry	Percent of injuries resulting in—			Average days lost per disability	
	Death and permanent total disability ¹	Permanent partial disability	Temporary total disability	Permanent partial disability	Temporary total disability
<i>Manufacturing—Continued</i>					
Miscellaneous manufacturing ²	0.4	8.2	91.4	875	15
Tobacco products.....	.2	4.7	95.1	1,077	11
Radios and phonographs.....	0	13.3	86.7	1,571	15
Smelting and refining (nonferrous).....	.7	7.5	91.8	1,166	20
Nonferrous metal products.....	.3	7.4	92.3	653	13
Brushes.....	(³)	(³)	(³)	638	20
Brooms.....	(³)	(³)	(³)	750	13
Coke ovens.....	(³)	(³)	(³)	1,825	36
Not elsewhere classified.....	.2	9.7	90.1	679	15
Ordinance and accessories.....	.2	5.8	94.0	692	13
Guns.....	.2	3.0	96.8	640	14
Ammunition, except for small arms.....	.3	11.5	88.2	737	15
Tanks.....	.4	5.3	94.3	650	8
Not elsewhere classified.....	0	3.8	96.2	650	14
<i>Nonmanufacturing</i>					
Construction ².....	.9	3.0	96.1	1,410	19
Building.....	.6	2.9	96.5	1,584	20
Heavy engineering.....	2.1	3.7	94.2	849	20
Highway.....	.9	2.0	97.1	1,038	14
Not elsewhere classified.....	1.4	2.5	96.1	800	16
Communication: Telephone.....	.9	1.0	98.1	1,329	19
Transportation ²	1.0	.9	98.1	956	18
Streetcar.....	.6	.8	98.6	540	24
Bus.....	.7	4.4	94.9	1,313	17
Both streetcar and bus.....	1.0	1.7	97.3	1,756	20
Trucking and hauling.....	1.1	1.1	97.8	969	15
Warehousing and storage.....	.9	1.0	98.1	300	11
Pipe liner (except natural gas).....	(³)	(³)	(³)	500	11
Not elsewhere classified.....	1.5	.4	98.1	1,800	18
Heat, light, and power.....	1.7	1.9	96.4	1,373	21
Electric light, and power.....	1.8	2.1	96.1	1,363	22
.....	1.1	1.0	97.9	1,475	17
Works.....	(³)	(³)	(³)	0	17
Personal services ².....	.3	1.5	98.2	641	16
Dry cleaning.....	0	4.0	96.0	2,022	18
Laundries.....	.1	6.1	93.8	1,400	19
Laundry and dry cleaning combined.....	.3	3.2	96.5	1,497	17
Amusements and related services.....	(³)	(³)	(³)	300	17
Hotels, and eating and drinking places.....	.2	.9	98.9	1,105	12
Medical and other professional services.....	0	.0	100.0	0	15
Miscellaneous personal services.....	(³)	(³)	(³)	0	19
Business services ².....	.6	1.3	98.1	689	14
Banks and other financial agencies.....	.8	1.6	97.6	1,450	15
Insurance.....	(³)	(³)	(³)	300	10
Real estate.....	.3	1.6	98.1	300	16
Miscellaneous business services.....	0	1.4	98.6	1,140	17
Educational services.....	(³)	(³)	(³)	0	16
Trade ².....	.5	1.8	97.7	1,026	15
Wholesale distributors.....	.7	2.2	97.1	1,303	14
Retail, general merchandise.....	.8	.6	98.6	1,080	14
Retail, food.....	.1	1.5	98.4	935	14
Retail, automobiles.....	.3	2.2	97.5	882	15
Filling stations.....	1.3	1.3	97.4	900	13
Retail, apparel and accessories.....	(³)	(³)	(³)	0	11
Miscellaneous retail stores.....	.2	2.7	97.1	1,021	18
Wholesale and retail trade combined.....	.6	2.4	97.0	1,184	15

¹ Each death or permanent-total disability is charged with a time loss of 6,000 days.² Data weighted by employment for manufacturing industries as shown by Census of Manufactures, 1939, and computed for 1941 by means of Bureau of Labor Statistics indexes of employment, and for non-manufacturing industries by Bureau of Labor Statistics employment data.³ Computations not given because of small number of injuries.

Manufacturing industries with 10.0 percent or more of permanent partial impairments—the general average being 5.7 percent—were: Explosives, 10.9; soap, 11.3; hardware, 10.2; stamped and pressed-metal products, 10.8; tinware, 10.6; partitions, shelving, and store fixtures, 11.9; cement, 12.7; railroad equipment, 10.9; radios and phonographs, 13.3; and ammunition (except for small arms), 11.5. Coupled with these high percentages were high average time charges per injury in industries manufacturing explosives (1,275 days), cement (1,275 days), and radios and phonographs (1,571 days).

Some of the manufacturing industries in which minor injuries predominated—as indicated by a high percentage of temporary total disabilities of short average durations—were those engaged in the production of cutlery and edge tools, boots and shoes, folding boxes, and tobacco products. Industries in which the average duration of this type of disability exceeded the average considerably are coke ovens, 36 days; cement, 34 days; iron and steel, 27 days; pulp and railroad equipment, 23 days each; rubber tires and petroleum refining, 22 days each; and explosives and logging, each with an average of 21 days.

Among the nonmanufacturing industries, laundries had the highest percentage of permanent partial impairments, with 6.1 percent. Bus operations averaged 4.4 percent; dry cleaning, 4.0 percent; and heavy engineering, 3.7 percent. The average time charges for these industries varied widely, from 300 each in warehousing and storage and real estate to 2,022 in dry cleaning, and 1,756 in the combined operation of streetcars and buses.

Hotels, and eating and drinking places had the highest percentage of temporary total disabilities, 98.9 percent, and a low average duration for such injuries of 12 days. Other nonmanufacturing industries with low average durations of temporary total disabilities were insurance, 10 days; retail of apparel and accessories, 11 days; warehousing and storage and pipe lines, each with 11 days; and filling stations, with 13 days.

Trend of Disabling Injuries in Manufacturing Industries

On the basis of the experience of 21,422 identical manufacturing establishments reporting for both 1940 and 1941, the upward trend of injuries, which started in 1939, continued through 1941. The index for that year was 85.8, against the 1940 index of 75.3, an increase of nearly 14 percent in the number of injuries per million employee-hours worked. The increase was general for all types of disability. Death and permanent total disabilities increased from an index of 71.4 for 1940 to 80.3 for 1941, permanent partial impairments from 84.8 to 93.7, and temporary total disabilities from 75.6 to 86.3. The percentage of increase was sharpest in this last group, 14.2 percent. The trend of the various types of disabilities is shown in table 7² and graphically in chart 3.

² For the method of construction of the index, see Monthly Labor Review, August 1941, pp. 352 and 353, (or Serial No. R. 1353): Industrial Injuries in the United States During 1940.

TABLE 7.—*Indexes of Injury Frequency Rates in Manufacturing, 1926-41, by Extent of Disability*¹
[1926=100]

Year	All injuries	Death and permanent total	Permanent partial	Temporary total
1926	100.0	100.0	100.0	100.0
1927	93.6	107.1	96.3	93.3
1928	93.2	107.1	104.6	92.5
1929	99.2	92.9	109.2	98.7
1930	95.5	107.1	111.0	94.6
1931	78.0	92.9	102.8	76.5
1932	80.9	107.1	113.8	78.9
1933	91.8	85.7	110.1	90.8
1934	93.6	107.1	128.4	91.6
1935	88.1	92.9	121.1	86.2
1936	85.7	85.7	114.7	84.1
1937	85.8	85.7	122.0	83.7
1938	71.7	71.4	78.9	68.1
1939	73.4	71.4	80.7	73.9
1940	75.3	71.4	84.8	75.6
1941	85.8	80.3	93.7	86.3

¹ Beginning with 1937, the indexes are based on the percent of change of the frequency rates or identical establishments in each pair of successive years.



LENGTHENED LIFE SPAN OF PRINTERS

FIFTY years ago the average span of life for a printer was only about 40 years—an age now considered to be “only the prime of life.” Today, records of the International Typographical Union indicate that the average union printer is expected to live to the age of between 64 and 65 years, or more than one-third longer than half a century ago.

Records of the I. T. U., dating back to 1892, disclose a generally steady increase in the life expectancy of the organized workers of the printing trade. In 1892, when the union membership was about 28,000, the average age at death of a member was 41 years. The average dropped to 40 years in 1895, but then began to improve and by 1915 the life span of union printers had risen to 50 years and by 1932 to 60 years. During the past 10 years this average has been further raised, and for the year ending May 20, 1942, the I. T. U. reported that the average age of a union printer at the time of death was 64.87 years—the highest age yet attained by this group of organized craftsmen.

The steady improvement in the mortality experience of union printers in recent years has even exceeded the union's calculations on the life expectancy of its members. On the basis of age and mortality records compiled by the union, it was estimated that 1,374 deaths would occur during the year 1938-39. The actual number of deaths, however, was only 1,300. In 1939-40 the actual number of deaths was 76 less than the estimated total, and in 1940-41 was 55 less. For the year ending May 20, 1942, altogether 1,430 deaths were estimated as expected, but only 1,253 deaths actually occurred. Thus, within the last 4 years a further increase has taken place in the longevity of printers, to the extent that the actual death rate was substantially lower than the expectancy rate based on most complete statistical records of the union.

According to the International Typographical Union, the gains in life expectancy have in general followed decreases in working hours and improvements in working conditions in the industry. (See table.) Half a century ago the typical printing shop was small, dark, dirty, and badly ventilated. These extremely poor conditions exacted a heavy toll of printers, with large numbers dying from tuberculosis and other respiratory diseases.

Trend of Death Rates and Average Age at Death Among Union Printers, 1892 to 1942

Year	Number of deaths	Average age at death	Average number of members	Deaths per 1,000 members
		Years		
1892.....	228	41.00	28,187	10.21
1893.....	439	41.50	30,454	11.11
1894.....	507	41.25	31,379	16.15
1895 and 1896.....	813	40.00	29,295 28,838	13.98
1897 and 1898.....	779	42.00	28,096 28,614	14.08
1899.....	430	42.16	30,646	14.03
1900.....	419	41.25	32,105	13.00
1901.....	406	41.94	34,948	11.60
1902.....	474	42.94	138,364	12.35
1903.....	476	42.62	42,436	11.21
1904.....	578	45.50	46,165	12.52
1905.....	567	45.26	46,734	12.13
1906.....	512	44.02	44,980	11.40
1907.....	561	46.07	42,357	13.20
1908.....	538	45.05	43,740	12.30
1909.....	509	46.09	44,921	11.30
1910.....	574	46.07	47,848	12.00
1911.....	639	49.12	51,095	12.50
1912.....	655	48.00	53,807	12.50
1913.....	687	49.24	55,614	12.30
1914.....	713	48.70	58,537	12.18
1915.....	696	50.84	59,571	11.70
1916.....	755	51.73	60,231	12.50
1917.....	825	51.42	61,350	13.44
1918.....	849	50.82	62,661	13.54
1919.....	1,142	45.12	65,203	17.50
1920.....	783	53.17	70,945	11.00
1921.....	730	54.32	74,355	9.80
1922.....	818	54.40	68,746	11.90
1923.....	804	54.40	68,144	11.80
1924.....	831	54.40	68,944	12.00
1925.....	856	57.68	70,372	12.16
1926.....	895	58.05	72,704	12.30
1927.....	952	57.94	74,829	12.70
1928.....	947	58.62	75,738	12.50
1929 ¹	1,099	58.71	76,015	13.80
1930.....	1,056	59.22	77,507	13.62
1931.....	1,143	59.60	77,757	14.68
1932.....	1,137	61.10	76,389	14.88
1933.....	1,065	60.77	74,062	14.38
1934.....	1,211	61.85	73,050	16.58
1935.....	1,197	62.28	73,586	16.26
1936.....	1,242	62.81	73,375	16.92
1937.....	1,272	61.85	74,781	17.00
1938.....	1,260	62.88	78,886	15.97
1939.....	1,300	63.77	79,362	16.38
1940 ²	1,202	61.10	79,347	15.15
1941.....	1,354	64.60	79,308	17.00
1942.....	1,253	64.87	79,664	15.73

¹ Including stereotypers and electrotypers for 7 months.

² Including photoengravers for 7 months.

³ June 1, 1928, to June 20, 1929.

⁴ June 21, 1939, to May 20, 1940.

Through persistent and intensive effort, the union has brought about marked improvement in shop conditions and has been in the forefront of efforts of organized labor to reduce weekly and daily hours of work to what is regarded as reasonable limits. The 11-hour day worked by printers in the latter part of the last century was reduced to 10 a day in the early 1890's and to 9 in 1898. Costly strikes were necessary to achieve the 8-hour day in 1906 and the 44-hour week in 1922, but the introduction of the 40-hour week about a decade ago was obtained without widespread work stoppages.

Union Benefits for Members

The union's efforts to improve the health of its members have not been confined to improvements in working conditions within printing establishments. Since 1892 the International Typographical Union has maintained the Union Printers' Home at Colorado Springs, Colo., to care for its sick and aged. This home, with its hospital and sanatorium facilities, has restored many ill printers to health and has enabled them to return to their trades. Each year more than 400 sick and aged members of the organization receive care at the institution.

The International Typographical Union also has a system of death benefits to care for the families of deceased members. These benefits, ranging from \$75 to \$500, are based on the number of years of continuous membership in the union. During 1941-42, the sum of \$568,009 was paid out in death benefits. The average payment amounted to \$453. Since the inception of the program in 1892, the union has disbursed \$13,468,171 to the beneficiaries of 40,178 members of the organization.

ains in
hours
table.)
dirty,
cted a
sis and

to 1942

aths per
000 mem-
bers

10.21
11.11
16.15
13.98

14.08
14.03
13.00
11.60

12.35
11.21
12.52
12.13
11.40
13.20
12.30
11.30

12.00
12.50
12.50
12.30
12.18
11.70
12.50
13.44

13.54
17.50
11.00
9.80
11.90
11.80
12.00
12.16

12.30
12.70
12.50
13.80
13.62
14.08
14.88
14.38

16.58
16.26
16.92
17.00
15.97
16.38
15.15
17.00
15.73

Court Decisions

LABOR DECISIONS OF THE SUPREME COURT, 1940 AND 1941 TERMS¹

DURING the two Supreme Court terms covering the period October 1940 to June 1942, opinions were rendered in many cases of great importance to labor. The majority of these cases dealt with industrial relations, and included decisions further defining the powers of the National Labor Relations Board and clarifying the status of unions in relation to the Sherman Act and the Federal Antiracketeering Act. The limits of protection extended to union pickets by the Federal Norris-LaGuardia Act, by corresponding State acts, and by the Federal constitutional guaranties of freedom of speech were also considered. Of particular interest were two rulings regarding a State labor relations act which forbids unfair labor practices by employees as well as by employers.

The Court upheld the constitutionality of the Fair Labor Standards Act of 1938, commonly known as the Federal wage and hour law, and thus sustained the power of Congress to regulate conditions under which articles shipped in interstate commerce are produced. State regulation of fees charged by private employment agencies was also upheld. This decision overruled a former holding that a State may not legally exercise such power.

Other cases which are included in this summary involved alien registration, migration of indigents, and several aspects of railroad employment.

In addition to the written opinions summarized in this article, the court, by denying review of other cases, left undisturbed a number of lower-court decisions affecting labor. In cases involving the National Labor Relations Act, the Court refused to review a decision that a collective-bargaining representative could validly be selected at an election which was boycotted by a majority of the employees in the bargaining unit,² or a decision sustaining the application of the act to a lumber dealer who made practically no interstate sales but who received nearly all of his materials from points in other States.³ Review was likewise denied of a decision holding that the fact that a claimed unfair labor practice also constitutes a violation of a collective-bargaining contract is without effect upon the Board's power to adjudicate the unfair labor practice and to enter an appropriate order.⁴ A lower-court decision that the Board has jurisdiction over automobile distributors who receive and sell automobiles in interstate com-

¹ Prepared in cooperation with the Division of Labor Standards and the Solicitor's Office of the U. S. Department of Labor.

² *New York Handkerchief Mfg. Co. v. National Labor Relations Board* (311 U. S. 704; see also 114 Fed. (2d) 144).

³ *Suburban Lumber Co. v. National Labor Relations Board* (314 U. S. 693; see also 121 Fed. (2d) 829).

⁴ *Newark Morning Ledger Co. v. National Labor Relations Board* (314 U. S. 693; see also 120 Fed. (2d) 262).

merce was left in effect,⁵ as was a holding that the Fair Labor Standards Act applies to working members of a "cooperative" found to be organized for the purpose of evading the wage and hour requirements of the Act.⁶

Wage and Hour Cases

The Fair Labor Standards Act of 1938 provides, with certain exceptions, that all employees engaged in interstate commerce or the production of goods for interstate commerce, must be paid minimum wages of at least 30 cents an hour, and one and one-half times the regular rate of pay for each hour in excess of 40 hours a week. The Administrator is empowered to establish wages in excess of 30 cents an hour by wage order, industry by industry, in order to attain as rapidly as economically feasible a minimum-wage rate of 40 cents an hour. The act also restricts the use of child labor in interstate commerce or in the production of goods for commerce. Decisions of the United States Supreme Court during the two terms under review have upheld the constitutionality of the Fair Labor Standards Act and have also passed upon important legal questions relating to its scope and effect.

Two cases challenging the constitutionality of the Fair Labor Standards Act were decided on the same day by unanimous decisions upholding the law. In *United States v. Darby* (312 U. S. 100), the Court held that Congress, in the exercise of its power to regulate interstate commerce, may forbid the manufacture, under substandard labor conditions, of goods that are shipped to other States for sale in competition with goods made at substantially higher wages and under better working conditions. The Court specifically overruled its decision in *Hammer v. Dagenhart* (247 U. S. 251), rendered in 1918, which held unconstitutional a statute prohibiting the interstate transportation of goods made by child labor.

In *Opp Cotton Mills v. Administrator* (312 U. S. 126), the Court upheld, against attacks asserting unconstitutional delegation of legislative power and denial of a full and fair hearing as required by due process of law, the wage-order provisions of the act. The Court further held that the factors considered by the Administrator, the composition of the industry committee, and the practice of the committee and the Administrator in formulating and issuing a wage order for the textile industry, were in accordance with all requirements of the Federal Constitution and of the act.

In the four remaining cases involving the Fair Labor Standards Act, the Court had an opportunity to examine in detail various provisions of the statute. In the *Jacksonville Terminal* case (315 U. S. 386) the Court held that there was an agreement, legal under the act, between the Terminal Company and the redcaps to the effect that tips should be counted as part of the wages; the employer guaranteed to make up the difference between the compensation received and the minimum wage. In the absence of such an agreement, tips would belong to the employees.

In the *Kirschbaum* and *Arsenal* cases⁷ the Court held that the act applied to maintenance and service workers employed by the owner

⁵ *Henry Lefaur, Inc. v. National Labor Relations Board* (312 U. S. 682; see also 115 Fed. (2d) 105).

⁶ *Caribbean Embroidery Cooperative, Inc. v. Fleming, Administrator* (62 Sup. Ct. 942; see also 123 Fed. (2d) 740).

⁷ *Kirschbaum v. Walling; Arsenal Building Corp. v. Walling* (62 Sup. Ct. 1116).

of a loft building whose tenants were principally engaged in the production of goods for interstate commerce. Although no hard and fast line could be drawn, the Court said, these employees were themselves engaged in production of goods for commerce because "they were engaged in occupations 'necessary to the production' of goods for commerce by the tenants."

In two other decisions, the Supreme Court for the first time interpreted the overtime provisions of the act. In the *Missel case*⁸ the Court agreed with the Administrator that, in the absence of a contract for a specific hourly rate of pay, the "regular rate" of pay used as the basis of overtime compensation, should be determined for each week by dividing the weekly wage by the number of hours worked during that week. In this case an employee had been hired, not at an hourly wage, but at a fixed weekly salary and worked a varying number of hours each week. The Court held that "time and a half" is computed on the employee's actual straight-time rate, and not on the minimum rate required by section 6 of the act.

In the *Belo case*⁹ the employer and employee had entered into a contract specifically setting a regular rate of pay and providing for one and one-half times that rate for overtime hours. The Administrator challenged the effectiveness of the contract, pointing out that, since it guaranteed a wage of not less than \$40 a week regardless of the number of hours worked, the hourly rate provided in the contract did not control the compensation and that the avowed purpose of the arrangement was to permit, as far as possible, the payment of the same total wage after the act as before, despite the overtime provisions. The Court held, however, with four justices dissenting, that since Congress did not define "regular rate," the courts should allow "the fullest possible scope to agreements among the individuals who are actually affected." The Administrator has requested a rehearing of this case on the ground that it conflicts with his decision in the *Missel case*.

Regulation of Employment-Agency Fees

A Nebraska law, limiting fees that may be charged by a private employment agency to 10 percent of the first month's wages, was upheld by the Supreme Court.¹⁰ The Court expressly overruled a prior decision, rendered in 1928, denying State power to regulate such fees (*Ribnik v. McBride*, 277 U. S. 350). The Court referred to a number of recent cases upholding the price-fixing power of the States and Congress and declared that "they represent in large measure a basic departure from the philosophy and approach" of the *Ribnik* decision.

Cases Involving the National Labor Relations Act

REFUSAL TO BARGAIN

Early in 1941 the Supreme Court held that a written, signed agreement is essential to the consummation of the process of collective bargaining within the meaning of the National Labor Relations Act

⁸ *Overnight Motor Transportation Co. v. Missel* (62 Sup. Ct. 1216).

⁹ *Walling v. A. H. Belo Corporation* (62 Sup. Ct. 1223).

¹⁰ *Olsen v. Nebraska* (313 U. S. 236).

and that an employer's refusal to enter into a written agreement with a union representing a majority of its employees constituted a refusal to bargain collectively.¹¹ Although the act does not compel an employer to agree to the proposals made by a union, the decision held that, once an agreement is reached in fact, a written contract embodying the terms agreed upon must be signed; otherwise the ends sought by the requirement of collective bargaining would be frustrated. The Court said that the signed agreement has been regarded as "the effective instrument of stabilizing labor relations."

In a case involving a publishing company,¹² the Court held that orders of the National Labor Relations Board may restrain only those unfair labor practices which the Board has found were committed by the employer and acts related to such practices or which, in the light of the record, are likely to occur. In this case, although the Board found that the employer's only violation of the act lay in his refusal to bargain collectively, it ordered him to refrain from violating the act in any manner whatever. This so-called "blanket order" was held by the Court to be improper in this case. The Court, however, recognized that in appropriate circumstances such provision would be proper. Such circumstances, for example, would be where the employer's unfair labor practices, though limited, evidenced an antiunion attitude which gave reasonable ground for apprehension of further and different violations.

EMPLOYER DOMINATION

In a unanimous opinion, the Court ruled that the National Labor Relations Board may invalidate a closed-shop contract with a nationally affiliated union which had been assisted in its organizing activities by the employer's unfair labor practices.¹³ Such illegal assistance may take the form of hostility toward one union and approbation of the other. The Court also held that under the act an employer may be charged with the antiunion activities of minor supervisors, whether or not he would be responsible for their activities under the common law doctrine of respondeat superior. If the employees believe the supervisor to be speaking for the management, a coercive effect is produced for which the employer is answerable since he vested this power in the supervisors.

In the *Electric Vacuum Cleaner Co. case*¹⁴ the Court likewise held that assistance to a nationally affiliated union renders a subsequent closed-shop agreement unlawful under the National Labor Relations Act. The fact that the union already represented a majority of the employees when the employer began to assist it to swell its ranks did not save the contract from invalidity. The assistance rendered in this case included closing down the plant until the organization with which the agreement was later made could "get its lines in order."

In another case involving the question of employer domination, the Court sustained an order of the National Labor Relations Board requiring the disestablishment of a company union.¹⁵ The Court reemphasized its frequently stated principle that the Board's judgment should prevail on disputed questions of fact such as whether a

¹¹ *H. J. Heinz Co. v. National Labor Relations Board* (311 U. S. 514).

¹² *National Labor Relations Board v. Express Publishing Co.* (312 U. S. 426).

¹³ *International Association of Machinists, etc. v. National Labor Relations Board* (311 U. S. 72).

¹⁴ *National Labor Relations Board v. Electric Vacuum Cleaner Co.* (62 Sup. Ct. 846).

¹⁵ *National Labor Relations Board v. Link-Belt Co.* (311 U. S. 584).

union was dominated by the company. It was to the Board and not to the courts, the Court said, that Congress entrusted the power to appraise conflicting and circumstantial evidence and to draw inferences from the facts. The same doctrine was reiterated in the *Nevada Consolidated Copper case*,¹⁶ where the Court held that when two possible "inconsistent inferences" are to be drawn from the evidence, the Board is not prevented from drawing one of them.

In the *Virginia Electric case*¹⁷ the Supreme Court sought to delineate the boundary between the coercion of employees and the employer's right to express his views on labor problems. The Court upheld the employer's right to state his views, but cautioned that even speech, when viewed in the light of all the surrounding facts, may constitute coercion of employees and thus violate the act. In this case the statements made by the employer had not been linked in the Board's findings to the surrounding background of employer action and the case was therefore remanded to the Board for further findings on the issue of coercion.

DISCRIMINATION AND REINSTATEMENT

In the first decision of its kind, the Court held that the Board may order an employer to hire workers who were refused employment by reason of their union membership, with back pay from the date of the discrimination.¹⁸ Since the refusal to employ was an unfair labor practice, the Court held that the Board had power to "neutralize the discrimination" by ordering employment and back pay.

In another case involving the question of back pay, the Supreme Court held that the Board was without power to require the employer to reimburse governmental work-relief agencies, such as the WPA, for funds paid to employees during the period of unemployment which followed their discriminatory discharge.¹⁹ The Court declared that the act was essentially remedial and that such reimbursement bore no reasonable relation to the purposes for which the Board was empowered by Congress to order payment of back pay to the employee.

In the *Southern Steamship Co. case*²⁰ a sit-down strike by seamen aboard a ship was held to be mutiny, even though the ship was in port, with the result that an order of the Board reinstating such strikers was denied enforcement. The ship was not in its home port but was in a domestic port. The Court held, however, that after sailors have signed the shipping articles and promised to obey the captain and other officers, a strike is mutiny not only on the high seas but in any waters within the admiralty and maritime jurisdiction of the United States.

In another decision, the Court held that an order of the Board directing a corporation to reinstate certain employees, with back pay, could not be avoided merely because the corporation had been dissolved.²¹

¹⁶ *National Labor Relations Board v. Nevada Consolidated Copper Corporation* (62 Sup. Ct. 960); see also *National Labor Relations Board v. Automotive Maintenance Machinery Co.* (315 U. S. 282).

¹⁷ *National Labor Relations Board v. Virginia Electric & Power Co.* (314 U. S. 469).

¹⁸ *Phelps-Dodge Corporation v. National Labor Relations Board* (313 U. S. 177).

¹⁹ *Republic Steel Corporation v. National Labor Relations Board* (311 U. S. 7).

²⁰ *Southern Steamship Co. v. National Labor Relations Board* (62 Sup. Ct. 886).

²¹ *Southport Petroleum Co. v. National Labor Relations Board* (315 U. S. 100).

ELECTIONS

Rulings of the National Labor Relations Board on bargaining rights in cases involving unfair labor practices were sustained by the Supreme Court in two cases. In the *Lorillard case*²² the Court enforced a Board order directing an employer to bargain with a union which at the time of the refusal to bargain had represented a majority of the employees but which was alleged to have lost its majority status since that time. The Court held that, as the loss of majority representation was a natural consequence of a refusal to bargain, the Board could reinstate the prior representatives in order to eradicate the effects of the unfair labor practice. Consequently, the lower court was without power to require the Board to conduct an election to determine whether the employees still wished to be represented by the union they had originally designated.

In the *Pittsburgh Plate Glass case*²³ the Court sustained the Board's finding that the appropriate unit for collective-bargaining purposes should include all six of the company's widely scattered plants, even though a majority of the employees at one plant had expressed a desire to bargain as a separate unit. The Court ruled that the act placed upon the Board the responsibility of determining the appropriate bargaining unit.

Other Industrial-Relations Cases

Several cases involving picketing by labor unions were decided by the Supreme Court. In one case²⁴ a Federal court was held, under the Norris-LaGuardia Act, to be without power to enjoin picketing alleged to constitute a violation of the Sherman Act. An A. F. of L. union of milk-wagon drivers, in combating a "vendor" system of distributing milk which was undermining union standards, and in an attempt to organize the vendors, picketed the cut-rate stores which sold milk distributed by the vendors. While this dispute was in progress, the vendors and other employees of the dairies involved organized and obtained a C. I. O. charter. The dairies and the C. I. O. union, alleging that the controversy was not a "labor dispute" within the meaning of the Norris-LaGuardia Act, sought an injunction against the activity of the A. F. of L. union, as an unlawful conspiracy aimed at establishing a milk monopoly at a high price, contrary to the Sherman Act. The Supreme Court held, however, that a "labor dispute" existed and that the requirements of the Norris-LaGuardia Act must be satisfied even if the conduct sought to be enjoined violated the Sherman Act.

On the other hand, a dispute between the Columbia River Packing Association and the Pacific Coast Fishermen's Union was held by the Supreme Court to be a controversy between sellers and buyers of fish, concerning terms of sale and not involving in any way the employer-employee relation which is an indispensable prerequisite to the existence of a "labor dispute."²⁵ The Supreme Court pointed out that the union, although nationally affiliated, was primarily an association of independent fishermen who owned or leased fishing vessels,

²² *National Labor Relations Board v. P. Lorillard Co.* (314 U. S. 512).

²³ *Pittsburgh Plate Glass Co. v. National Labor Relations Board* (313 U. S. 146).

²⁴ *Milk Wagon Drivers' Union Local 753 v. Lake Valley Farm Products, Inc.* (311 U. S. 91).

²⁵ *Columbia River Packers Association v. Hinton* (315 U. S. 143).

and carried on their own business independently and not as employees of the packers.

The remaining cases concerning industrial relations involved interpretations of State laws, and originated in State courts. In general they dealt with the problem of the extent to which and under what circumstances the State may control or forbid the right to picket, without infringing on the constitutional guaranty of free speech.

In the *Swing case*, the Court upheld peaceful picketing by a union having no members in the establishment picketed.²⁶ The common-law policy of a State cannot limit such picketing to cases in which the controversy is between the employer and his own employees; members of the union which had not succeeded in organizing Swing's employees were entitled to exercise their right of "free communication." That right, the Court held, "cannot be mutilated by denying it to workers, in a dispute with an employer, even though they are not in his employ." Illinois does not have an anti-injunction law of the Norris-LaGuardia type.

In the *Wohl case*, the Supreme Court upheld the right of a bakery drivers' union to protest against a system of distributing bakery products through independent peddlers, by picketing bakeries and retailers doing business with the peddlers.²⁷ The New York Court of Appeals ruled that the controversy was not a "labor dispute" within the meaning of the State anti-injunction law and therefore that the picketing might be enjoined. The Supreme Court held, however, that "one need not be in a 'labor dispute' as defined by State law to have a right under the fourteenth amendment to express a grievance in a labor matter by publication unattended by violence, coercion, or conduct otherwise unlawful or oppressive." Although "a State is not required to tolerate in all places and all circumstances even peaceful picketing by an individual," the record revealed no unusual circumstances warranting infringement of the drivers' right of free speech.

The Court in the *Ritter case*, decided the same day as the *Wohl case*, held that the State of Texas could constitutionally bar even one-man peaceful picketing under the circumstances there present.²⁸ In that case a cafe was picketed by a carpenters' union because the owner was having a building erected a mile and a half away by a nonunion contractor. The Supreme Court held that a State statute could be applied to protect the economic interests of third parties who have business dealings with one of the parties to a labor dispute and that "restriction of picketing to the area of the industry within which a labor dispute arises leaves open other traditional modes of communication." This was a 5-to-4 decision with two separate dissenting opinions.

In the *Meadowmoor Dairies case* the Court held that in a labor dispute a State court could issue an injunction against picketing which was closely associated with violence.²⁹ The injunction barred all forms of picketing and other strike activities; it was upheld on the ground that in view of the past violence the State court could properly find, as it did, that even peaceful picketing would operate coercively on the customers by arousing fears that the violence would be resumed. The union was left free to apply to the State court for modification of

²⁶ *American Federation of Labor v. Swing* (312 U. S. 321).

²⁷ *Bakery and Pastry Drivers' Local 802 v. Wohl* (62 Sup. Ct. 816).

²⁸ *Carpenters Union Local 213 v. Ritter's Cafe* (62 Sup. Ct. 807).

²⁹ *Milk Wagon Drivers Local 753 v. Meadowmoor Dairies, Inc.* (312 U. S. 287).

the injunction on the ground that passage of time had deprived currently peaceful picketing of its coercive influence. That question, the Court said, would be reviewable by the Supreme Court, if the State court refused modification under circumstances establishing that the injunction against all picketing had outlived its usefulness to "counteract a continuing intimidation."

In the first decision arising under a State labor relations law forbidding unfair labor practices by employees, the Supreme Court sustained an order of the Wisconsin Employment Relations Board directing four Milwaukee labor unions to cease and desist from picketing and boycotting two hotels.³⁰ As construed by the State court in enforcement proceedings, both the order and the act under which it was issued forbade only violence and permitted peaceful picketing.

In another decision involving the same Wisconsin statute, the Court ruled that a State may forbid participation in mass picketing, in addition to threats and violence, as an unfair labor practice.³¹ The Court also specifically upheld the sections of the law which forbade employees' threatening other employees; obstructing streets, sidewalks, and factory entrances; and picketing employees' homes. The argument that, by enacting the National Labor Relations Act, Congress had so completely occupied the field of labor disputes subject to that act as to preclude Wisconsin from dealing with such disputes through its Employment Peace Act was rejected by the Court, which upheld the power of the State over such local matters as public safety and use of the streets where the occasion for an exercise of the power was a labor dispute. The State power, as exercised by Wisconsin, was held not to come into conflict with rights guaranteed by the Constitution or by the National Labor Relations Act.

The Federal Antiracketeering Act was held by the Supreme Court not to apply to traditional trade-union activity, such as exaction of an agreement to pay wages regardless of whether or not the tendered services of union members are refused.³² The Antiracketeering Act prohibits coercing any person to pay money for "protective services" by means of threats, inducements, or acts of violence, but expressly excepts "the payment of wages by a bona fide employer to a bona fide employee." The Court held that the trade-union practices complained of came within the scope of this exception. Those practices were as follows:

A local of the teamsters' union, through its economic strength and through physical coercion, compelled the hiring of local union members to drive out-of-town trucks from the city limits into New York, or, as an alternative, the out-of-town drivers were permitted to proceed and do their own work on payment of the equivalent of a day's wages at regular union rates. The main question was whether the enforced payment of union rates when the union men performed no actual work constituted "the payment of wages by a bona fide employer to a bona fide employee." The Court held that such an arrangement was protected by the exception in the law since the union stood ready to supply union labor to do the work, and since the union was acting to protect legitimate interests of its members.

The Supreme Court also held that the officials of a union are not liable for prosecution under the Sherman Act for peaceful picketing

³⁰ *Hotel and Restaurant Employees' Local 122 v. Wisconsin Employment Relations Board* (315 U. S. 437).

³¹ *Allen-Bradley Local No. 1111 v. Wisconsin Employment Relations Board* (62 Sup. Ct. 820).

³² *United States v. Local 807* (315 U. S. 521).

and boycotting of an employer in connection with a jurisdictional dispute with another union.³³ The Court held that the acts of the union did not constitute a violation of the Sherman Act, as modified by the general purposes of the Clayton and Norris-LaGuardia Acts. "So long as a union acts in its self-interest and does not combine with nonlabor groups" section 20 of the Clayton Act legalizes the picketing. Section 20 is not limited to employer-employee disputes but includes jurisdictional disputes by outsiders; the definition of "labor dispute" in the Norris-LaGuardia Act has this broadening effect upon the Clayton Act. In sum, the question of whether union conduct violates the antitrust laws is to be determined "only by reading the Sherman law and section 20 of the Clayton Act and the Norris-LaGuardia Act as a harmonizing text of outlawry of labor conduct."

Miscellaneous Cases

A Georgia statute, making it a crime for a person to contract to perform services, thereby obtaining money in advance, with an intent not to perform the services, was held to violate the thirteenth amendment to the Constitution and the Federal laws prohibiting peonage.³⁴ Since one who receives an advance on a contract for services, which he is unable to repay, is bound by the threat of penal sanctions to remain at his employment until the debt has been discharged, the statute produces a form of "involuntary servitude."

The so-called "anti-Oakie" law of California, which made it a misdemeanor for anyone to assist an indigent person of another State to enter California, was invalidated by the Supreme Court as an unconstitutional burden on interstate commerce.³⁵ Similar statutes have been passed in some 27 other States. Although acknowledging that the continuous movement of large segments of our population has given rise to "urgent demands upon the ingenuity of government," the Court declared that no single State could isolate itself "from difficulties common to all of them by restraining the transportation of persons and property across its borders." A minority of four judges voted to place the invalidity of the statute upon the "privileges and immunities" clause of the Constitution instead of holding that the movement of indigent persons is protected by the commerce clause; these judges regarded the right to move freely from State to State as an established attribute of national citizenship.

In a 6-to-3 decision, the Supreme Court held the Pennsylvania Alien Registration Act to be invalid.³⁶ This law, which was enacted in 1939, made it mandatory for aliens to register and carry identification cards subject to inspection by police and certain State officials. In 1940 Congress enacted a national alien registration law requiring the registration and fingerprinting of aliens. In holding the Pennsylvania law invalid, the Court pointed out that the power of States to enact regulatory legislation affecting aliens is subordinate to the legislative and treaty-making power, and that Congress had fully occupied the field of alien registration. The supremacy of national power in regard to foreign affairs, including immigration, naturalization, and deportation of aliens, is made clear by the Constitution.

³³ *United States v. Hutcheson* (312 U. S. 219).

³⁴ *Taylor v. Georgia* (315 U. S. 25).

³⁵ *Edwards v. California* (314 U. S. 160).

³⁶ *Hines v. Davidowitz* (312 U. S. 52).

Since Congress saw fit to deal with the entire subject, the Court ruled that even those portions of the State statute which are not in express conflict with the national system of registration could not stand.

Several cases of importance to railroad employees were decided by the Supreme Court. In one case³⁷ the Court held that a railroad employee is not required to exhaust the remedies available to him under the Railway Labor Act before instituting court action on an employment contract. The employee, a member of the Brotherhood of Railroad Trainmen, brought suit against his employer, a railroad company, claiming that he had been discharged contrary to the terms of a contract with the union. The railroad contended that the case was prematurely brought because of the employee's failure to utilize the grievance-adjustment machinery provided by the Railway Labor Act and the union agreement. The Court held, however, that the act did not purport to take from the courts authority to determine a case of wrongful discharge nor did it make an administrative finding a prerequisite to filing a suit.

In another case, the Court held that a Federal district court had improperly granted an order to restrain a State official from enforcing the penal provisions of the Nebraska Full-Crew-Train Act.³⁸ The Court relied on the familiar rule that courts of equity do not ordinarily restrain criminal prosecutions, and pointed out that Federal courts are not authorized to interfere with criminal prosecutions in the States except on a clear showing that "irreparable injury" was threatened. Failing such a showing in this case, the Court held that the criminal liability of the railroad company should be determined by the State courts.

In a third case involving railroad employees, the Court held that the Interstate Commerce Commission, in authorizing a railroad to abandon certain lines, has power to attach to its order conditions for the protection of labor.³⁹ The Commission authorized a railroad to substitute busses for railroad lines, but held that it lacked the power to make provision for employees adversely affected by the abandonment. The Court held that there was no such limitation on the powers of the Commission, and remanded the case to it to determine the nature of the conditions to be attached.

³⁷ *Moore v. Illinois Central Railroad Co.* (312 U. S. 630).

³⁸ *Beal v. Missouri Pacific Railroad Co.* (312 U. S. 45).

³⁹ *Interstate Commerce Commission v. Railway Labor Executives Association* (62 Sup. Ct. 717).

Cooperation

OPERATIONS OF CREDIT UNIONS IN 1941

Summary

DURING the past decade the credit union movement has had a remarkable growth, and especially since the passage of the Federal Credit Union Act in 1934. That act is available for groups in States without any enabling legislation or having unsatisfactory credit union laws. During the period 1936 through 1941, the number of chartered credit unions nearly doubled; there was a net increase of more than 5,000 associations during this interval. Membership and annual business more than tripled, and total assets in 1941 were nearly 4 times as great as in 1936.

Federal credit unions have been increasing at a faster rate than have those chartered under State acts. During the period 1936-41 the proportion of Federal credit unions rose from 34.8 to 46.0 percent of the total number of associations, their membership increased from 27.0 to 39.5 percent of the total, their volume of business from 15.6 to 37.0 percent of the total amount of loans made, and their total assets from 11.3 to 32.8 percent of the combined assets.

From 1940 to 1941 the total number of credit unions increased 10.0 percent, membership 25.2 percent, business done 18.6 percent, and total assets 27.6 percent.

During 1941, the credit unions in the United States made over 2,400,000 loans to their members, totaling nearly \$363,000,000. Their membership exceeded 3½ million persons and their total assets amounted to over \$322,500,000. Their operations yielded net earnings of over \$14,000,000, from which the members received, on their share capital, dividends amounting to over \$8,800,000. In addition Ohio borrowers received the sum of \$8,097 in what amounts to patronage refunds (i. e., "interest rebates") required under the amended Ohio law. Some of the Nebraska credit unions also follow the practice of making patronage returns on interest paid by borrowers, at the same rate as is paid in dividends on share capital; no data are available as to the amount so returned in 1941.

Altogether, at the end of 1941, there were 10,425 of these cooperative credit associations, of which 9,653 were in active operation during the year. Their funds consist of share capital subscribed by the members and their business (loans made) is done only with members. Although for practical reasons credit unions do not operate on an unrestricted membership basis and only a few practice the Rochdale principle of return of patronage refunds, the credit union movement and the consumers' cooperative movement proper are gradually approaching each other at several points. Thus the central credit union federation, the Credit Union National Association, has since March 1939 been a fraternal member of the Cooperative League of the U. S. A. Also, during the past few years an increasing number

of credit unions have been formed among the membership of consumers' cooperatives. These cooperative credit associations have the universal endorsement of the central educational and commercial organizations in the consumers' cooperative movement, and several of these—the regional cooperative wholesales—have actively supported the formation of credit unions.

The annual meetings of three wholesales—Consumers Cooperative Association, North Kansas City, Mo., the Farmers' Union State Exchange, Omaha, Nebr., and the Farmers' Union Central Exchange, South St. Paul, Minn.—passed resolutions urging the creation of more credit unions among the membership of the member associations. It was reported that, during 1941, 35 credit unions were organized in local cooperatives affiliated with the Farmers' Union Central Exchange. Local affiliates of the Indiana Farm Bureau Cooperative Association were reported to have 47 credit unions, with about 6,000 members and combined assets of over half a million dollars.

By the end of 1941 the number of active Federal credit unions connected with consumers' cooperatives totaled 117. The 116 reporting associations had a combined membership of 19,754, made loans during 1941 amounting to \$1,573,554, and had total assets of \$1,273,083. Similar data are not available for the cooperative credit unions under State charter.

Considering credit unions of all types combined, at the end of 1941 six States (Illinois, Massachusetts, New York, Ohio, Pennsylvania, and Wisconsin) had over 500 associations each, and in three of these (Illinois, New York, and Wisconsin) credit union membership exceeded 300,000. Illinois was the leading State as regards loans made (nearly \$44,000,000), but loans totaling over \$30,000,000 were made in each of the States of Massachusetts and New York.

The data on which the above findings are based were furnished to the Bureau of Labor Statistics for the State-chartered associations in most cases by the State officials—usually the Superintendent of Banks—charged with supervision of these associations. Alabama data were supplied by the State Credit Union League. Other exceptions were Iowa and North Carolina (whose reports were unavoidably delayed beyond the closing of the Bureau's tabulations¹) and Mississippi, North Carolina, South Carolina, and Texas for which no reports were available; for these States estimates were made, based upon the trend in previous years. The same was done also for certain items concerning which some States do not require reports. The data for all of the Federal associations were furnished by the Federal Credit Union Division, formerly in the Farm Credit Administration but recently transferred to the Federal Deposit Insurance Corporation.

The data shown for individual States include both the Federal and State associations, except in Delaware, Hawaii, Nevada, New Mexico, South Dakota, and Wyoming, where there is no State credit union act. In Connecticut where the State act was passed in 1939 and in Vermont whose statute was enacted in 1941, no State associations had been chartered at the end of the year; the Vermont Department of Banking and Insurance reported that one association had been licensed in February 1942 and Connecticut was anticipating applications in the near future. For all of these States the figures therefore cover Federal credit unions only.

¹ The Iowa report was received too late for inclusion, but would make no great change in the figures here shown.

Operations in 1940 and 1941

The membership and business of credit unions are shown, by States, for the years 1940 and 1941 in table 1. The data are for the calendar years in all States except Arizona, Iowa, and New Hampshire where they are for years ending June 30, 1940 and 1941.

The differences shown in the table between the total number chartered and the total number reporting are accounted for almost entirely by associations newly chartered which had not yet gone into operation by the end of the year and those which were in liquidation but had not given up their charters.

The table shows a practically nation-wide increase in all the items shown in the table, from 1940 to 1941. The only decrease in number of associations was in Georgia and the only loss in membership was in South Carolina. It is of interest to note that only two States (New Mexico and South Carolina) had a smaller volume of business in 1941 than in 1940, although six others (District of Columbia, Hawaii, Louisiana, Maryland, and North Dakota, and Wyoming) made a smaller number of loans in 1941.

Among the outstanding gains during 1941 were those made in number of associations in Ohio (over 17 percent), in membership in Wisconsin (157 percent), and in amount of loans made in Connecticut and Florida (53 and 60 percent, respectively).

TABLE 1.—Operations of Credit Unions in 1940¹ and 1941, by States

State, and type of charter	Year	Number of associations ²		Number of members	Number of loans made during year	Amount of loans—	
		Chartered	Reporting			Made during year	Outstanding end of year
All States.....	1941	10,425	9,653	3,532,006	2,408,398	\$362,779,153	\$219,855,642
	1940	9,477	8,890	2,820,622	2,191,621	305,930,051	190,250,726
State associations.....	1941	5,632	5,509	2,135,310	1,392,463	228,447,194	150,605,155
	1940	5,267	5,175	1,700,390	1,292,553	200,943,260	134,740,783
Federal associations.....	1941	4,793	4,144	1,396,696	1,015,935	134,331,959	69,249,487
	1940	4,210	3,715	1,120,232	899,068	104,986,791	55,509,943
Alabama.....	1941	89	87	22,550	22,508	3,416,654	1,814,307
	1940	87	85	24,587	19,417	2,559,556	1,514,519
Arizona.....	1941	23	22	3,920	2,819	484,561	298,828
	1940	21	20	3,128	2,539	420,549	253,639
Arkansas.....	1941	40	35	5,498	6,240	537,831	260,072
	1940	39	36	4,867	5,561	508,910	238,570
California.....	1941	498	457	211,423	147,282	26,866,712	17,425,644
	1940	445	414	176,651	126,303	22,898,827	15,149,858
Colorado.....	1941	113	106	27,626	20,966	3,348,893	1,870,415
	1940	110	105	24,545	19,356	2,671,113	1,740,072
Connecticut ⁴	1941	212	190	95,356	66,780	8,461,724	3,981,202
	1940	201	178	69,966	51,471	5,521,426	2,752,885
Delaware.....	1941	13	11	3,200	2,724	263,705	148,763
	1940	12	9	2,542	1,725	221,289	101,903
District of Columbia.....	1941	126	115	78,632	57,864	8,213,770	4,916,584
	1940	118	108	70,255	60,702	7,806,279	4,478,712
Florida.....	1941	201	178	39,142	46,560	5,558,363	2,749,794
	1940	166	149	30,395	31,416	3,486,878	2,081,128
Georgia.....	1941	156	145	45,047	35,637	5,136,700	3,266,827
	1940	157	153	39,350	30,904	4,487,280	2,368,617
Hawaii ⁴	1941	100	93	37,353	21,547	4,918,591	2,777,388
	1940	97	95	33,722	34,194	4,437,697	2,519,132
Idaho.....	1941	41	39	4,630	3,240	407,462	216,481
	1940	38	35	3,824	2,874	322,133	173,196
Illinois.....	1941	841	831	366,491	272,118	43,495,547	26,132,514
	1940	758	743	310,809	262,488	37,385,536	22,924,981
Indiana.....	1941	332	310	105,144	79,572	10,538,820	5,292,534
	1940	307	288	86,826	69,986	8,249,814	4,556,032
Iowa.....	1941	215	212	52,379	45,834	5,776,291	4,331,256
	1940	210	205	47,183	40,684	5,057,297	3,627,695
Kansas.....	1941	138	132	26,749	19,070	2,663,027	1,832,090
	1940	126	122	21,272	16,244	2,150,418	1,494,910

See footnotes at end of table.

TABLE 1.—Operations of Credit Unions in 1940¹ and 1941, by States—Continued

State, and type of charter	Year	Number of associations ²		Number of members	Number of loans made during year	Amount of loans—	
		Chartered	Reporting			Made during year	Outstanding, end of year
Kentucky.....	1941	129	124	33,824	³ 26,293	³ \$3,894,881	\$2,692,844
	1940	127	113	32,668	³ 24,391	³ 3,099,023	2,450,938
Louisiana.....	1941	139	122	³ 35,110	³ 26,844	³ 3,897,804	2,101,101
	1940	118	105	³ 31,003	³ 30,747	³ 3,441,868	1,883,186
Maine.....	1941	47	37	9,997	9,280	939,425	567,886
	1940	41	35	8,420	5,426	747,761	512,030
Maryland.....	1941	75	72	³ 32,768	³ 25,389	2,708,068	1,470,670
	1940	74	72	³ 29,206	26,565	2,338,363	1,350,783
Massachusetts.....	1941	565	547	³ 260,293	180,764	33,098,818	20,305,406
	1940	531	517	³ 226,450	159,969	30,109,316	18,339,221
Michigan.....	1941	283	261	106,208	79,012	13,504,348	8,623,108
	1940	256	235	83,533	66,207	11,703,055	7,336,295
Minnesota.....	1941	400	373	79,828	64,877	8,144,246	8,113,066
	1940	369	364	74,372	63,663	7,854,645	7,342,896
Mississippi.....	³ 1941	25	22	6,151	4,662	499,457	328,662
	1940	20	18	³ 5,520	³ 4,300	³ 477,311	³ 281,799
Missouri.....	1941	396	386	104,262	³ 78,918	³ 11,748,393	7,720,939
	1940	377	355	94,666	³ 68,689	³ 9,688,709	7,242,490
Montana.....	1941	42	37	5,383	³ 2,960	³ 332,776	207,722
	1940	31	27	3,815	³ 2,320	³ 248,333	154,427
Nebraska.....	1941	212	208	35,540	33,470	4,901,728	2,445,199
	1940	201	196	32,593	30,905	4,258,712	2,203,417
Nevada ⁴	1941	6	6	777	381	50,978	26,369
	1940	6	6	685	324	37,727	20,553
New Hampshire.....	1941	18	18	6,170	³ 4,898	³ 1,005,141	698,518
	1940	16	16	5,265	³ 4,292	³ 845,155	575,638
New Jersey.....	1941	276	250	112,797	79,733	9,817,258	5,267,197
	1940	245	234	91,848	76,907	8,655,825	4,566,673
New Mexico ⁴	1941	13	10	1,522	1,171	151,867	81,254
	1940	13	11	1,472	1,250	169,327	69,674
New York.....	1941	908	805	308,711	³ 231,211	³ 37,076,869	21,015,536
	1940	796	725	255,463	³ 197,351	³ 30,712,998	18,002,843
North Carolina.....	³ 1941	191	172	38,120	29,377	3,010,230	1,774,677
	1940	171	150	28,792	24,951	2,582,364	1,502,312
North Dakota ⁴	1941	115	88	8,578	5,523	633,721	313,336
	1940	87	68	³ 7,561	³ 5,526	³ 459,018	237,203
Ohio.....	1941	709	654	232,967	154,709	23,035,873	12,990,877
	1940	603	574	196,447	³ 142,705	18,358,204	10,368,673
Oklahoma.....	1941	³ 95	³ 89	³ 17,672	³ 12,873	³ 2,070,347	1,250,711
	1940	93	89	³ 15,512	³ 11,678	³ 1,686,219	1,070,095
Oregon.....	1941	³ 85	³ 77	18,639	16,476	1,994,661	1,361,249
	1940	77	70	16,465	13,186	1,735,420	1,217,987
Pennsylvania.....	1941	674	604	263,338	163,254	22,813,354	11,872,196
	1940	600	546	201,179	151,587	18,218,517	9,799,832
Rhode Island.....	1941	39	33	23,520	10,693	2,109,086	3,579,689
	1940	34	29	20,168	10,074	1,751,999	3,109,366
South Carolina.....	³ 1941	61	44	6,677	4,649	442,502	235,285
	1940	50	44	³ 8,378	³ 6,575	³ 541,148	³ 274,640
South Dakota.....	1941	35	34	5,440	4,117	502,274	249,502
	1940	24	23	4,350	3,714	447,750	223,517
Tennessee.....	1941	156	136	43,049	³ 38,003	³ 5,061,609	2,676,693
	1940	145	130	40,122	³ 34,563	³ 4,147,721	2,548,360
Texas.....	³ 1941	439	388	98,394	97,522	13,162,428	8,171,474
	1940	401	356	³ 96,568	³ 90,557	³ 11,173,725	6,924,808
Utah.....	1941	68	62	12,299	³ 8,716	³ 1,418,856	944,188
	1940	58	53	11,325	³ 8,592	³ 1,093,323	784,788
Vermont ⁴	1941	7	5	265	405	29,466	15,693
	1940	5	3	265	268	14,348	6,937
Virginia.....	1941	122	101	29,035	³ 29,535	³ 3,280,036	1,739,941
	1940	111	93	27,843	29,180	3,078,118	1,672,046
Washington.....	1941	247	236	51,527	35,547	5,943,541	3,527,655
	1940	221	218	45,693	³ 35,452	³ 4,497,402	2,786,110
West Virginia.....	1941	81	71	19,499	³ 14,282	³ 1,578,172	938,435
	1940	71	61	17,029	³ 12,477	1,261,950	816,835
Wisconsin.....	1941	607	600	396,159	³ 78,000	13,645,437	9,133,782
	1940	593	592	153,849	³ 70,000	12,144,474	8,507,044
Wyoming ⁴	1941	22	18	2,347	1,003	186,852	100,081
	1940	20	17	2,175	1,306	165,221	91,459

¹ Some revisions made in 1940 figures.² Most of the difference between the total number of associations and the number reporting is accounted for by associations chartered but not in operation by the end of the year and associations in liquidation which had not relinquished their charters.³ Data partly estimated.⁴ Federal credit unions only; no State-chartered associations in this State.

Funds, Earnings, and Dividends, 1940 and 1941

Marked increases in share capital, total assets, net earnings, and dividends paid on share capital were shown in 1941 as compared with 1940. These are shown, by States, in table 2.

TABLE 2.—Assets, Earnings, and Dividends of Credit Unions, 1940¹ and 1941, by States

State, and type of charter	Year	Number of associations reporting	Paid-in share capital	Total assets	Net earnings	Dividends
All States.....	1941	9,653	\$273,452,767	\$322,515,073	\$14,126,052	\$8,802,367
	1940	8,890	211,205,824	252,743,971	11,050,800	7,006,767
State associations.....	1941	5,509	176,635,819	216,858,234	9,650,476	6,084,703
	1940	5,175	145,794,999	180,649,090	7,727,354	4,880,185
Federal associations.....	1941	4,144	96,816,948	105,656,839	4,475,576	2,717,664
	1940	3,715	65,410,825	72,094,881	3,323,446	2,126,582
Alabama.....	² 1941	87	2,042,999	1,971,266	110,849	82,235
	1940	85	1,512,255	³ 1,767,675	³ 84,721	65,510
Arizona.....	1941	22	317,577	359,974	³ 16,421	11,442
	1940	20	248,224	285,018	15,397	11,176
Arkansas.....	1941	35	313,817	358,891	17,920	11,960
	1940	36	251,168	289,427	15,337	11,436
California.....	1941	467	19,958,493	23,796,573	³ 991,213	² 646,031
	1940	414	15,972,764	19,114,143	³ 659,648	² 469,901
Colorado.....	1941	106	2,421,568	2,902,091	³ 103,783	68,546
	1940	105	1,757,645	2,272,401	³ 70,624	² 52,694
Connecticut ³	1941	190	7,849,210	8,319,830	243,617	154,259
	1940	178	3,975,566	4,274,190	158,031	101,330
Delaware.....	1941	11	178,830	198,319	9,436	6,858
	1940	9	120,286	131,735	6,661	4,475
District of Columbia.....	1941	115	6,186,339	6,859,675	398,714	235,749
	1940	108	5,201,306	5,792,543	² 280,834	200,901
Florida.....	1941	178	3,125,054	3,512,655	² 230,964	156,770
	1940	149	2,267,355	2,572,612	² 125,992	90,700
Georgia.....	1941	145	3,157,843	4,486,967	² 153,695	² 104,665
	1940	153	2,638,744	3,809,840	² 99,471	² 65,030
Hawaii ³	1941	93	4,225,353	4,567,829	198,782	37,727
	1940	95	2,822,417	3,149,862	157,198	105,945
Idaho.....	1941	39	335,916	258,024	12,001	7,061
	1940	35	174,183	200,759	8,685	5,324
Illinois.....	1941	831	35,182,645	37,978,757	1,870,916	1,227,289
	1940	743	27,201,862	29,510,611	1,520,410	1,010,910
Indiana.....	1941	310	7,471,393	8,237,403	² 345,691	² 241,005
	1940	288	5,479,129	6,053,877	259,038	156,096
Iowa.....	² 1941	212	4,147,093	5,051,142	262,062	161,262
	² 1940	205	3,583,679	4,323,725	131,813	118,352
Kansas.....	1941	132	2,068,683	2,315,206	² 105,789	² 69,882
	1940	122	1,523,938	1,718,557	91,887	56,978
Kentucky.....	1941	124	3,193,566	3,598,063	² 79,251	² 52,920
	1940	113	2,757,274	2,937,941	² 62,380	² 46,506
Louisiana.....	1941	122	2,526,465	2,859,675	142,082	100,088
	1940	105	2,015,302	2,289,933	126,787	83,838
Maine.....	1941	37	578,336	833,291	32,083	19,496
	1940	35	436,255	707,431	21,631	20,305
Maryland.....	1941	72	1,974,477	2,264,282	100,052	63,074
	1940	72	1,517,200	1,751,832	91,573	61,208
Massachusetts.....	1941	547	24,632,816	32,980,008	² 1,035,699	759,899
	1940	517	20,442,319	27,860,637	899,175	646,291
Michigan.....	1941	261	12,173,905	13,837,169	² 614,396	436,049
	1940	235	9,290,118	10,613,435	² 340,537	257,642
Minnesota.....	1941	373	7,390,818	10,096,017	² 387,357	288,015
	1940	364	6,599,851	9,004,138	382,084	264,294
Mississippi.....	² 1941	22	290,402	385,120	16,640	11,297
	1940	18	² 235,948	² 323,623	² 13,009	² 8,540

See footnotes at end of table.

TABLE 2.—Assets, Earnings, and Dividends of Credit Unions, 1940¹ and 1941, by States—Continued

State, and type of charter	Year	Number of associations reporting	Paid-in share capital	Total assets	Net earnings	Dividends
Missouri.....	1941	386	\$9,367,484	\$10,875,052	² \$480,147	² \$318,546
	1940	355	7,907,292	8,988,575	² 328,720	¹ 225,097
Montana.....	1941	37	242,392	267,557	10,468	6,862
	1940	27	167,518	185,747	8,624	5,829
Nebraska.....	1941	208	1,732,691	4,772,780	128,420	52,303
	1940	196	1,454,267	3,916,067	114,645	47,104
Nevada ²	1941	6	27,563	31,487	1,616	807
	1940	6	22,268	23,689	922	626
New Hampshire.....	1941	18	437,311	846,977	37,224	13,062
	1940	16	381,807	728,106	28,226	10,839
New Jersey.....	1941	250	8,742,922	9,443,724	342,438	210,131
	1940	234	6,152,368	6,727,167	272,854	174,617
New Mexico ²	1941	10	96,682	105,668	5,390	4,092
	1940	11	75,159	83,449	4,349	3,000
New York.....	1941	805	26,758,806	31,432,757	1,641,962	818,644
	1940	725	20,972,376	25,177,867	1,384,334	669,091
North Carolina.....	² 1941	172	1,789,618	2,222,936	83,327	64,018
	1940	150	1,414,004	1,832,537	² 74,405	² 58,650
North Dakota.....	1941	88	387,352	441,834	15,699	11,099
	1940	68	250,133	288,487	10,514	7,783
Ohio.....	1941	654	17,254,310	18,856,740	868,677	521,949
	1940	574	11,508,077	12,700,736	² 738,125	389,094
Oklahoma.....	1941	89	654,959	1,626,834	² 80,154	² 56,167
	1940	89	508,138	1,300,344	² 52,064	² 36,994
Oregon.....	1941	77	1,540,724	1,757,505	80,851	53,072
	1940	70	1,318,496	1,524,450	65,049	40,963
Pennsylvania.....	1941	604	16,475,236	18,521,538	778,903	473,426
	1940	546	11,719,940	13,320,751	598,914	397,925
Rhode Island.....	1941	33	2,870,921	5,385,272	150,790	89,677
	1940	29	2,374,549	4,376,416	135,645	80,974
South Carolina.....	² 1941	44	312,891	362,986	15,713	14,275
	² 1940	44	319,242	353,389	14,076	7,128
South Dakota ²	1941	34	315,557	351,965	17,646	11,298
	1940	23	249,154	277,261	14,083	9,020
Tennessee.....	1941	136	3,307,854	3,916,410	225,709	77,528
	1940	130	2,715,992	3,245,513	202,070	71,030
Texas.....	² 1941	388	8,946,176	10,146,239	523,276	362,236
	1940	356	7,215,584	8,296,477	² 442,088	301,816
Utah.....	1941	62	993,026	1,153,390	² 59,243	² 39,074
	1940	53	773,945	902,626	34,563	24,361
Vermont ²	1941	5	23,937	25,511	883	481
	1940	3	7,823	8,615	376	281
Virginia.....	1941	101	1,837,815	2,344,207	² 75,446	47,578
	1940	93	1,480,867	1,973,536	² 69,687	49,423
Washington.....	1941	236	4,275,023	4,708,987	253,962	159,488
	1940	218	3,103,484	3,479,210	195,828	121,612
West Virginia.....	1941	71	982,929	1,219,973	69,488	47,237
	1940	61	724,997	932,177	² 34,387	² 22,040
Wisconsin.....	1941	600	12,323,653	13,535,262	692,551	390,995
	1940	592	10,270,026	11,238,678	598,395	332,073
Wyoming ²	1941	18	121,337	133,235	6,656	4,677
	1940	17	93,530	106,087	4,934	3,335

¹ Some revisions made in 1940 figures.² Partly estimated.³ Federal credit unions only; no State-chartered associations in this State.

Trend of Credit Union Development, 1936 to 1941

The noteworthy expansion that has taken place since 1936 is shown in table 3. That the Federal credit unions have expanded at a much faster rate than the State associations is indicated in the second section of the table.

TABLE 3.—Relative Development of State and Federal Credit Unions, 1936 to 1941

[Revised figures for State associations]

Item and year	Total associations	State-chartered associations	Federal-chartered associations
Number of credit unions:			
1936.....	5,352	3,490	1,862
1937.....	6,292	3,792	2,500
1938.....	7,314	4,299	3,015
1939.....	8,326	4,782	3,544
1940.....	9,479	5,269	4,210
1941.....	10,425	5,632	4,793
Membership:			
1936.....	1,170,445	854,475	315,970
1937.....	1,588,236	1,055,736	532,500
1938.....	1,927,226	1,236,826	690,400
1939.....	2,405,377	1,459,377	946,000
1940.....	2,815,558	1,695,358	1,120,200
1941.....	3,532,006	2,135,310	1,396,696
Amount of loans during year:			
1936.....	\$100,199,695	\$84,541,635	\$15,658,060
1937.....	147,210,321	110,625,321	36,585,000
1938.....	180,847,548	129,058,548	51,789,000
1939.....	238,903,457	159,403,457	79,500,000
1940.....	306,092,625	201,105,625	104,987,000
1941.....	362,779,153	228,447,194	134,331,959
Total assets:			
1936.....	\$83,070,952	\$73,659,146	\$9,411,806
1937.....	115,399,287	97,087,905	18,311,382
1938.....	147,156,416	117,672,392	29,484,024
1939.....	192,723,812	145,226,718	47,497,094
1940.....	252,293,141	180,198,260	72,094,881
1941.....	322,515,073	216,858,234	105,656,839

PERCENTAGE DISTRIBUTION

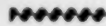
Year	Total number of associations		Membership		Amount of loans during year		Total assets	
	State	Federal	State	Federal	State	Federal	State	Federal
1936.....	65.2	34.8	73.0	27.0	84.4	15.6	88.7	11.3
1937.....	60.3	39.7	66.5	33.5	75.1	24.9	84.1	15.9
1938.....	58.8	41.2	64.2	35.8	71.4	28.6	80.0	20.0
1939.....	57.4	42.6	60.7	39.3	66.7	33.3	75.4	24.6
1940.....	55.6	44.4	60.2	39.8	65.7	34.3	71.4	28.6
1941.....	54.0	46.0	60.5	39.5	63.0	37.0	67.2	32.8

COMPARATIVE DEVELOPMENT OF FEDERAL AND STATE CREDIT UNIONS FROM 1940 TO 1941

Table 4 shows for the associations chartered under Federal and State laws the percent of increase shown from 1940 to 1941 in certain important items. As it indicates, the State credit unions obtained a larger percentage of new members than did the Federal associations; their respective increases in membership were 25.6 and 24.7 percent. In all other respects, however, greater gains were shown by the Federal credit unions than by those chartered under State laws.

TABLE 4.—Relative Gains by State and Federal Credit Unions, 1941 Compared to 1940

Item	Percent of increase, 1940 to 1941		
	Both types	State associations	Federal associations
Total number of associations.....	10.0	6.9	13.8
Membership.....	25.2	25.6	24.7
Number of loans made.....	9.9	7.7	13.0
Amount of loans—			
During year.....	18.6	13.7	28.0
Outstanding at end of year.....	15.6	11.8	24.8
Paid-in share capital.....	29.5	21.2	48.0
Total assets.....	27.6	20.0	46.6
Net earnings.....	27.8	24.9	34.7
Dividends.....	25.6	24.7	27.8



THE COOPERATIVE MOVEMENT AND THE WAR

THE war has had far-reaching repercussions upon the cooperative movement throughout the world. Cooperatives in the democratic countries have mobilized their entire strength in the war effort, not alone because of their interests as citizens, but also because the aims of the Axis powers are diametrically opposed to the principles of freedom and democratic action upon which the cooperative movement was founded. The cooperative attitude is typified in the statement of the Central Board of the British Cooperative Congress in 1940 that "only those who are free can cooperate. The voluntary nature of our movement is its prime foundation."

Never in the history of the cooperative movement have cooperators faced such devastating attacks upon their principles and institutions as those which have been perpetrated in the countries dominated by the Axis powers. During the first World War, although the movement passed through exceedingly difficult periods, at no time was a "total" attack directed at its principles and methods of operation. When cooperatives failed, in the period 1914-18, it was usually an individual matter in which the individual association was unable to survive the disruption of the economy resulting from war. Today, in one country after another, the cooperative movement has been destroyed or subverted to the will of the aggressor, not only as the result of the destruction of life and property in wartime, but largely because of its democratic and autonomous character and the ideals for which it stands. The destruction of the German, Italian, Austrian, and Sudetenland cooperatives with over 4,500,000 members was merely the beginning. The Spanish, Czechoslovak, Polish, Norwegian, Danish, Dutch, Belgian, and French movements, including some of the oldest and most advanced organizations, accounted for the loss of another 8,000,000 members. The Greek, Yugoslav, Lithuanian, Latvian, and Estonian cooperatives have also been destroyed or shorn of their cooperative characteristics. Finland is the only country, where cooperatives are a significant factor in the national economy, that has cast its lot with the Axis powers.

During the first World War the International Cooperative Alliance maintained contact with cooperators in all of the important belligerent and neutral countries. In this war, international cooperation and

communication between societies and wholesales of one country and another have nearly ceased to exist. No longer is "co-op" oil from America sold in the stores of Holland, France, Estonia, Bulgaria, and Sweden. Today "co-op" condensed milk from Holland, paper products from Estonia, "Luma" electric bulbs from Sweden, sardines from Norway, and butter and bacon from Denmark, can rarely be exchanged for the products of other cooperatives from across the seas. In April 1942, American cooperatives received what is definitely expected to be the last shipment of "co-op" tea from the joint English and Scottish Cooperative Wholesale Society plantations on Ceylon.

It will doubtless be some time before the full effects of the war upon the cooperative movement in the United States can be evaluated. General price-control legislation has only recently been introduced. The rationing program and the restrictions on supply have already affected a large number of commodities distributed through cooperative associations, compelling many societies to revise their distributing and operating policies. Petroleum associations, for example, are endeavoring to expand into other fields as a result of the rationing of tires and gasoline.

The tasks which cooperators face and the operations in which they engage in a world at war are necessarily different in various countries. The conditions under which they do business in neutral countries, in nations at war, or in occupied territories, are largely determined by forces beyond their control.

The "total" nature of this war, characterized by complete mobilization of economic resources, has introduced entirely new and complicating factors in the trading activities of the movement. Stringent wartime controls are substituted for the regulations of peacetime. Never before was a thorough knowledge of consumers' needs and habits more important in the formulation of cooperative trade policies. Continual shifts in purchasing power, increased mobility of population, limitations on supply, rationing, price control, and an augmented burden of taxation are among the many factors influencing cooperative operations. The ingenuity and resourcefulness of the management and of elected management committees and directors are constantly taxed in the effort satisfactorily to serve the members, keep expenses down, and operate under a host of governmental orders and regulations.

In all cases where cooperatives have been permitted to maintain their free and autonomous democratic organizations, they have endeavored to protect the interest of their members as consumers in the face of war conditions. Efforts have been made to prevent or delay general price rises and to eliminate the bases for profiteering. Faced with the possibility of restricted supplies of consumers' goods, cooperatives have increased their inventories of essential commodities. They have continually urged their governments to introduce effective rationing in order that the goods which are in short supply may be distributed equitably among all sections of the population. Their task was made especially difficult where governments failed to establish effective controls or were slow in remedying obvious defects. Vigilance has been exercised to see that quality standards are maintained as corollaries to price-fixing laws. Where supply is limited, local societies and central organizations have endeavored to educate the consumer to the use of substitutes so that the goods in question can be replaced by equally acceptable substitutes. The cooperatives abroad have

been especially active in urging substitution and standardization of products in order to overcome so-called monopolies of opinion and habit and to eliminate other bases for monopolistic price formation in wartime. Also receiving attention are problems of post-war rehabilitation and the reconstruction of the cooperative movement in the occupied and enemy countries after the war.

Cooperatives in the Allied Nations

GREAT BRITAIN

British cooperators are unanimous in their determination to support the war as the only means of safeguarding their own freedom and democratic institutions which have been won by the sacrifices of many generations. Only a few days after the declaration of war against Germany, the National Cooperative Authority of Great Britain, representing the retail, wholesale, and productive societies, the cooperative press and the Cooperative Party, declared: "Hitler has challenged the democratic States. * * * We are faced with the issue of Nazi-ism versus continued democratic progress. In such circumstances, the cooperative movement, like all other democratic movements, must be prepared to use to the full its resources to assist in bringing the conflict to a successful issue for the democratic cause."

The unanimity of opinion in the cooperative movement today is in sharp contrast to the attitude during the last war. On the whole, the British movement, with its 8,750,000 members, is in a much better economic and political position than it was before. This is largely due to the movement's economic development since 1918, and to the fact that it has become an indispensable force in supplying the buying public of Great Britain. Roughly, 43 percent of the total population was represented in 1940 through one or more family members trading in cooperative stores.

TABLE 1.—*Development of Cooperative Movement in Great Britain, by 5-Year Intervals, 1900-35, and by Years, 1936-40*

Year	Members		Amount of sales	
	Number	Percent of population	Total	Per member
1900.....	1,703,000	4.6	£50,000,000	£29
1905.....	2,146,000	5.5	61,000,000	28
1910.....	2,529,000	6.2	71,000,000	28
1915.....	3,241,000	7.7	102,000,000	31
1920.....	4,460,000	10.5	252,000,000	57
1925.....	4,865,000	11.1	182,000,000	37
1930.....	6,347,000	14.2	216,000,000	34
1935.....	7,423,000	16.3	218,000,000	30
1936.....	7,746,000	16.9	232,000,000	30
1937.....	8,021,000	17.4	249,000,000	31
1938.....	8,344,000	18.1	261,000,000	31
1939.....	8,581,000	18.5	270,000,000	32
1940.....	8,652,000	18.6	296,000,000	34

English cooperators and employees serving with the military, naval, and air forces of the Empire have their own cooperative. The Navy, Army, and Airforce Institute, popularly known as "Naffy," is undoubtedly the largest and oldest soldiers' and sailors' cooperative society in the world. First organized as the Canteen and Mess Cooperative Society by three army officers in 1894, for the purpose of eliminating the privately operated canteens characterized by high

prices, shoddy goods, and dirty quarters, "Naffy" in 1941 had a staff of 40,000 which was growing at the rate of 1,000 a week. Its weekly sales in 1941 amounted to over \$7,000,000. In 1918 "Naffy" had sales of \$45,000,000 on which patronage refunds of \$4,000,000 were made; the American expeditionary forces shared in this amount.

Largely because of the prestige of the movement, collaboration with the British Government was immediately possible at the outbreak of hostilities, and thus many of the obstacles to full mobilization of resources which occurred in the last war were avoided. The Cooperative Party, for example, was founded in 1917, largely as the result of the movement's resentment of the way in which cooperative associations were discriminated against in the operation of wartime regulations, especially in the method of allocating supplies, in the drafting of key men into the army, in the operation of certain provisions of the excess profits tax, and in nonrepresentation on the trade advisory committees. Today, British cooperatives are officially represented on most of the food committees and the regional and central price-regulation boards, and recognition is generally accorded where the movement has a real interest.

Upon the outbreak of the present war the attention of the movement was immediately directed to the problems involved in protecting the members as consumers. Cooperators vigorously advocated the introduction of rationing in order to insure that the available supplies would be distributed equitably. As the war progressed, the movement urged the extension of rationing and price control, and the cooperatives did not hesitate to indicate their dissatisfaction with the early policies of the Ministry of Food. At the Seventy-third Annual Congress of the Cooperative Union, held at Edinburgh in June 1941, a resolution was adopted stating:

This congress expresses its profound dissatisfaction at the slowness of the Ministry of Food in extending the rationing system and in controlling prices, a delay which often permits speculators to profiteer at the expense of retailers and consumers. This congress urges upon the Government the necessity of rapidly expanding the rationing system to cover all foodstuffs which are or may become in short supply, with complete registration and rationing from importer or manufacturer to consumer, with price control rigidly enforced, as the only effective means of relating supplies to movements of population, and of securing equity of treatment for all consumers.

The principal devices utilized by the Government in meeting the economic and fiscal problems of war consisted of restrictions on supply, production, and sales for civilian consumption, price control, and increases in direct and indirect taxation. The combined effect of these devices had far-reaching effects upon the trading activities of the cooperative movement.

Limitations of supplies.—The invasion of Denmark, Norway, and the low countries eliminated Great Britain's access to the traditional sources of such foodstuffs as eggs, butter, bacon, and condensed milk. This necessitated the introduction of rationing in order to avoid serious maldistributions resulting from differences in the income structure throughout the country.

Although sugar, butter, and bacon were rationed during the first few months of the war, the rationing of meat (March 11), tea (July 6), cooking fats (July 22), and margarine (September 2) followed slowly in 1940. Preserves and cheese were rationed in March and May of 1941, and a system of registration for eggs, onions, and milk was also

introduced in 1941. In November 1941 a point system was introduced for the distribution of canned meat and canned fish.

An examination of the consumer registrations with cooperatives for rationed goods reveals that one in every four persons of the civilian population of Great Britain and Northern Ireland was obtaining the six principal rationed commodities through retail cooperative societies in July 1941. The percentages for the difference commodities were as follows:

	Percent of population
Sugar.....	25.6
Butter and margarine.....	24.7
Bacon and ham.....	23.2
Cooking fats.....	24.7
Preserves.....	25.6
Cheese.....	24.0

Variations between the percentages shown for July 1941 and the percentages for the first and second registrations did not exceed 5 percent, and are probably attributable to such factors as shifts in population and absorption of men and women into the armed forces. In the first registration, sugar registrations at cooperative associations in England and Wales alone constituted an estimated 29.7 percent of the civilian population, as compared with 23.4 percent in the registration at the time of the first World War.

Cooperative members of Parliament have constantly called attention to the "black market," the existence of which defeats the very purpose of rationing, and demanded severe penalties for violators of the regulations. Drastic penalties were recently provided and these were welcomed by the cooperative movement. Especially notorious has been the "black market" in eggs, which resulted from the governmental exemption accorded to owners of fewer than 50 hens. As a result of this exemption relatively well-to-do consumers are able to bid the prices up, making their purchases directly from small farmers. For this reason the "black market" in eggs has been particularly objectionable to cooperatives, which before the war had distributed almost a tenth of the nation's egg supply, mainly to low-income groups.

The Government promulgated the first of its Limitation of Supplies Orders in April 1940. From that time onward, restrictions were increased and by the beginning of 1942 supplies of goods for the domestic market were very limited as compared with the pre-war period.

Price control.—The principal effort toward general price control was initiated with the Prices of Goods Act of 1939 which made it illegal to increase the price of any of a large number of articles of household commodities by an amount greater than the sum necessary to cover increased costs. Enforcement of the act proved exceedingly difficult in view of the inability accurately to determine costs at any given moment, and it soon became evident that the act exerted little influence in restraining price rises. Only in 1941 was price control widely extended, and maximum prices were prescribed for a large number of commodities at all stages of distribution.

Many cooperators felt that the Prices of Goods Act of 1939, enforcement of which was left largely in the hands of the buying public, was a failure, in view of the fact that the average consumer did not have the necessary knowledge, let alone the necessary will to complain, to make

the system really effective. Accordingly, they welcomed the enforcement provisions of the Goods and Services (Price Control) Act of 1941, with its system of Government inspectors. Because of the general provisions of that act and of the Limitations of Supply Order of September 1941, however, the cooperatives urged standardization of certain goods in order to facilitate enforcement by the creation of quality floors.

The above legislation complicated the operations of the retail societies to a considerable degree. Dry-goods departments were more directly affected than were the food departments, especially as a result of the purchase tax imposed in October 1940 and the Consumer Rationing Order of May 29, 1941. The Cooperative Wholesale Society's sales of drapery, men's wear, and furnishings and hardware dropped 16, 17, and 27 percent, respectively, for the year ended January 10, 1942. In the case of the pottery factories production declined 56 percent. By February 1942, 25 percent of the nonfood stores in Glasgow had been forced to close as a result of the shortage of goods. Although prescribed prices for regulated commodities resulted in maintaining margins, the increased cost of supplies and services continued to exert an upward pressure on expenses. The price rises resulted in increases in cash sales, with the general result of a decline in the rate of dividend on purchases, although in many instances the aggregate amount of dividend was as much as before.

The system of selective price control was such that many private traders, especially the chains, chose their market regardless of the interest of the consumer and were able to divert the flow of supplies from one outlet to another, securing thereby an advantage at the expense of the regular customer. The Cooperative Wholesale Society, on the other hand, had consistently refused to take advantage of market conditions and priced its commodities to the retail societies on the basis of the price at which the goods were purchased. In a number of cases the Cooperative Wholesale Society found its selling prices for commodities fixed at a lower level than that at which replacements could be obtained from the manufacturer or importer.

The enactment of price-control legislation also resulted in attacks upon one of the pillars of the cooperative movement, namely the refund on patronage (widely known in Great Britain as the "divi"). Private traders held that the patronage dividend in wartime was essentially a price-cutting device. The Petroleum Board, early in the war, granted supplies to a certain local society only when it gave a pledge to make no refunds on purchases. This was of little importance in view of the fact that that particular society sold little gasoline. More recently, however, an attack has been made on the patronage refund on milk purchases and certain members of Parliament have suggested that it should be prohibited "for the duration." This attack is largely attributable to the fact that the cooperatives, which handle a third of the nation's milk supply, have rationalized distribution to such a degree that they are now able to sell milk cheaper than private retailers. The milk department of C. W. S. practically doubled its sales in 1941 and the output of the creameries was correspondingly increased.

Purchase tax.—The purchase tax imposed in October 1940 was enacted on the ground that in addition to providing revenue, it would assist in reducing the consumption of certain scarce commodities. The

cooperative movement expressed strong opposition to the tax, contending that it would have an inflationary tendency and would hinder the equitable distribution of the commodities in short supply. Following some experience with its operation, cooperative managers felt that the tax failed to accomplish its purpose, since there was no apparent effect upon the activities of the buying public. At the same time, they observed that the tax was burdensome because it affected the necessities of working-class demand. Although well-to-do persons are usually supplied for a long period, the less fortunate consumers must constantly be replacing their clothing and household goods as they wear out. In addition, the tax was particularly oppressive to those persons whose homes had been destroyed through action of the enemy and who had to buy furnishing for other dwellings.

The first problem facing the stores as trading enterprises in connection with the purchase tax was its effect upon the net margin and patronage return. In perhaps no other country in the world has the patronage refund become the institution that it is in England. In the pre-war period English cooperators preferred to maintain the rate of dividend even at the cost of allowing prices to rise in excess of the current market. Where sales are swollen by indirect taxes (which are passed on to the consumer without netting a greater amount of surplus for the association), the original amount of profit must be figured on a higher value of sales when the patronage return is computed. The net result is a reduction in the rate of dividend. On the other hand, the purchase tax apparently helped some cooperative stores as much as it hindered them. Thus, the tax raised the aggregate cash sales, and since expense ratios are computed on sales, the large increase in the price level of the dry-goods departments, which was partly due to the tax, seemingly produced a volume of sales sufficient to neutralize the rise in expenses. On the whole, the increase in cash sales in 1941 apparently neutralized the increase in expense ratios.

Practically all aspects of merchandising have been affected by restrictions of one type or another. The number of sizes of canned goods has been reduced, and as the result of the Paper Control Order (effective November 12, 1940) the use of wrappings has been limited, thus encouraging a return of the traditional "woman with the basket." Similarly the scarcity of steel and timber prevented the opening of new shops except in munitions towns. The United Cooperative Laundries Association, with depots covering a large area of northwest England, anticipated the shortage of gasoline early in the war and began conversion of its fleet of delivery trucks to the use of coal gas. This necessitated in many cases the construction of large crates on the top of the trucks in which gas bags could be placed. Other societies purchased electric cars.

Other factors affecting operations.—The cooperatives in England suffered enormous physical damage as a result of enemy action. There was material destruction of both goods and plant.

Prior to the outbreak of the war the cooperative movement had urged societies to protect themselves against the ravages of war by the creation of plans for mutual aid. In a few cases these plans were put into operation and proved exceedingly helpful following damage by air raids. The Cooperative Union and the Cooperative Wholesale Society explored the possibility of establishing a fund to assist local societies, composed of contributions from the individual associations.

A plan was formulated, but subsequently abandoned in view of the War Damages Act and the fact that the Board of Inland Revenue would not permit societies to deduct from the income and excess-profits tax their contributions to such voluntary plans. Even contributions paid out of reserve funds or made as the result of members' voluntarily leaving in the association a portion of their dividends were considered taxable. The tax problem still remained, moreover, under the War Damages Act, since the Government held that contributions under the act were a necessity if the capital assets were to be preserved and that, accordingly, sums diverted for such purposes could not be viewed as having been paid out of income.

The Government's plan involves compulsory contributions of all owners of land and buildings for compensation for damage to buildings and immovable property, and compulsory insurance of all assets such as plant, machinery, office and store equipment with a value of over £1,000. The fact that such contributions were treated as a capital liability, and not as an expense item, presented difficult problems for the cooperatives when paid out of current earnings, since the net effect was a reduction in the amount available for dividends, with a corresponding increase in the net income chargeable with income and excess-profits tax. However, most cooperative members readily accepted the reduction in the dividend rate in view of the special circumstances.

Cooperative associations also lost a large number of employees, well trained in efficient methods of operation, as a consequence of the demands of the armed forces and the calls for war work. Toward the end of 1941, the London Cooperative Society alone had 5,000 employees in the armed forces. The associations found it necessary to employ temporary personnel and "trainees," many of whom were in their turn drafted into the army, navy, or air force. The problems involved in utilizing the services of a large number of new employees forced the shops to simplify their displays, introduce self-service markets similar to those in the United States, and standardize procedures for stores in different areas. This in turn facilitated the work of clerks shifted from one store to another and assisted patrons who were forced to move to different areas as the result of war work or the dislocation of industry. The ability of the cooperative management to adapt itself to wartime conditions by the establishment of efficient and orderly systems of distribution was attested by the fact that lines of waiting customers, widely condemned in the press, were rarely seen outside of cooperative shops.

Early in the war an effort was made to obtain a uniform wage policy for the employees of the movement as a whole, and although there was some difficulty in obtaining the consent of all of the local wage boards, the principle was finally accepted and resulted in an agreement between the National Wages Council of the Cooperative Union and the 11 principal trade-unions representing cooperative employees. The first agreement, made in the latter part of 1939, affected approximately 200,000 workers and provided for a bonus in view of the rising cost of living. Subsequent cost-of-living bonuses were also granted. Compulsory arbitration of disputes referred to the National Conciliation Board was an important feature of the system. It was agreed that any dispute arising during the war was to be referred to the National Conciliation Board. The Board's independent chairman,

acting as arbitrator, was empowered to render binding decisions in the event that the Board could not reach a unanimous agreement, and was authorized to act and render such decisions even without receiving the consent of the parties to the submission of the issue involved.

The Government's plans for the concentration of industry introduced a new and unforeseen element into the cooperative method of doing business. These plans included the "telescoping" of industry, and were originally outlined as voluntary arrangements in which each branch of industry would decide which would be the "nucleus" firm and which the "closed" or "redundant" one. "Nucleus" firms were to produce at full capacity. Accordingly, British cooperatives, for probably the first time in their history, were forced to produce for private enterprise or face extinction. Some cooperative factories which were not permitted to produce for civilian consumption are now engaged in making equipment, uniforms, and shoes for the armed forces and civilian defense services.

On the whole, it is evident that the British movement is playing an important role in the war economy. The strong financial position of the movement and its enormous trading resources, together with the fact that it represents a large section of the buying public, are undoubtedly responsible for the public recognition which it has received. At the beginning of 1941, the retail cooperatives, with a share capital of £156,400,000¹ had investments amounting to £135,500,000, of which £85,000,000 was in Government securities. The combined investment of the cooperative movement in Government securities amounted to over £116,000,000.

One cooperative association formulated a "Keynes Plan" of its own, in accordance with which patronage dividends were placed in a reserve to be released to members after the war. Although the plan was in the nature of a war "patrons' equity" reserve, it was dropped as the result of an adverse opinion from the revenue officials.

The total effect of the war legislation upon cooperatives is not yet entirely clear. Their sales have increased as the result of increases in price levels. On the other hand, restrictions in physical volume resulting from the limitations on supply have tended to equalize the effect of price rises and anticipatory buying. The general effect was an increase in cash sales in 1940-41, although the position during the last few months of 1941 became stationary and there was evidence of a tendency towards a decline in the value of cash sales. Still further restrictions in the volume of sales, together with the operation of more effective price controls, resulting in aggregate cash sales on a decreased basis, with higher expense ratios, will undoubtedly cause further declines in the rates of patronage refund.

Despite the large movement from evacuated areas, the damage done by enemy actions, the increased mobility of labor, calls for military service, and problems of supply, the retail trade of the movement amounted to £1,500,000,000 in 1941, on which patronage dividends of £20,000,000 were distributed to members.

BRITISH DOMINIONS AND POSSESSIONS

Virtually every Dominion and possession of the British Empire has experienced the problem of short supply, calls for military service,

¹ Exchange rate of pound in 1941 = \$4.03.

difficulties in maintaining imports and exports, and increased fiscal burdens. Canadian cooperatives, notably the agricultural marketing associations (including the wheat pools and elevator systems) and the consumers' cooperative oil refineries, are rendering important service in the battle for production. Consumers' cooperative associations have urged their members to earmark patronage refunds for the purchase of war savings certificates, and the Cooperative Union of Canada has suggested that local associations build up investments in Government securities as a cushion against a post-war decline. Retail societies supplying groceries and other food products increased in number from 48 in 1939 to 74 in 1940. During the year 1939-40 the 1,151 farmers' associations, with 450,453 members, did a total business of \$236,322,466.²

In the Union of South Africa, the consumers' cooperative formed by railway workers at Pietermaritzburg, with 24 departments and a mail-order business, handled a large number of military contracts.

The war found the movement in India, with its 6,080,000 members, struggling to overcome the depressed conditions in agriculture. It appears, however, that the war has given a new impetus to the establishment of consumers' cooperative stores in the Provinces, generally for the purpose of safeguarding the members against the activities of speculators and profiteers. Considerable progress was also reported in the development of cooperatives on the plantations of Ceylon. During the year 1939-40 the number of societies of all types in Ceylon rose from 1,512 to 1,659 and membership from 66,397 to 71,929. Working capital increased from 4,738,627 to 5,158,001 rupees during the same period.³

In New Zealand, with the outbreak of war, the export of primary products to feed overseas forces became of supreme importance. A cooperative contract system for loading and discharging vessels had been in operation among the dock workers in a number of ports, but the need for improving the method of working cargoes resulted in the appointment of an official commission in 1940. The commission decided to utilize the cooperative contract system and to extend it to other ports. On the basis of information obtained by the commission, it estimated that "the loading and discharging of overseas vessels under the cooperative contracting system has resulted in an average savings of 3 days per ship."

The cooperative movements in the Federated Malay States and Straits Settlements, which were predominantly of the credit type, have probably been destroyed or placed under the Japanese system of control. In Manchuria, for example, the Japanese placed the movement under the direct control of the authorities. Within a month after the passage of the Cooperative Promotion Law of 1940, all existing rural loan and financing societies were dissolved and their assets acquired by new "cooperative" organizations, the chairmen, directors, and auditors of which were appointed by the Government. The plan was adopted following the refusal of the peasants to sell their produce at the artificially low price levels fixed by the officials, and was designed to compel them to surrender the crops which they had mortgaged with the cooperatives, since the assets of the societies

² Exchange rate of Canadian dollar in 1940=90.9 cents.

³ Exchange rate of rupee in 1940=30.2 cents.

had been effectively acquired by the new government-sponsored organizations.

CHINA

Largely because of their spectacular contribution to China's war effort, attention has been centered on the activities of the Chinese industrial cooperatives. The cooperative movement in China, however, as in the case of most Asiatic countries, is still predominantly a credit movement, although the war has increased the relative importance of all types of consumers, marketing, and productive societies. In June 1941, 86.2 percent of the societies were credit, 0.5 percent were supply, 9.3 percent were productive, 2.0 percent were marketing, 1.6 percent were consumers', and 0.4 percent were miscellaneous types, including insurance.

The increase in number of societies and members from 1937 to 1940 is shown in table 2.

TABLE 2.—*Growth of the Cooperative Movement in China, 1927-40*¹

Year	Number of societies	Number of members
1937.....	46,983	2,139,634
1938.....	64,565	3,112,629
1939.....	91,426	4,366,758
1940.....	116,199	5,998,476

¹ Data include estimates for occupied territory.

China, perhaps more than any other country at war, has faced the wholesale destruction of crops, the dislocation of trade and industry, and the migration of millions of its people. Early in the war China's modern industry, found principally in the five or six large coastal cities, was lost to the enemy. The gravity of the industrial situation called for urgent measures, as the ability to resist the aggressor depended upon the reconstruction of industry. Enormous price rises have aggravated the situation, despite the price-control system introduced early in 1937 and its subsequent drastic modifications.

The lack of capital and of heavy industry to produce machinery and inadequate transportation facilities seemed to present insurmountable difficulties. It was in the midst of this situation that the industrial cooperatives were organized. Plans for the formation of a vast network of about 30,000 small producer-consumer associations were well under way in 1941. These cooperatives are organized in accordance with the model rules drawn up by the League of Nations' cooperative expert in China and provide for one vote per member, election of chairman and management committees, and minimum membership requirements. They are financed through the Chinese Industrial Cooperative Association with what would appear to us to be incredibly small sums (\$50 being sufficient for a garment unit or a surgical-goods unit, and \$200 for a cotton-weaving unit). Direct grants by the Government were also an important factor in the formation of the associations.

With little more than \$500,000 in capital in the beginning of 1939, the movement established almost 3,000 small-scale mobile industrial units within a short period of time. These were divided into three

sections. The first section, consisting of light-tool units, which could be evacuated on short notice, operated close to the front and in some cases even behind enemy lines. (In one mountain forest region, hidden Chinese armies depended upon the cooperatives for all of their warm clothing.) The second section consisted of heavier tool and machine works placed some distance from the front. The third section was located safe in the interior and was engaged in the production of capital and consumer goods.

In addition to manufacturing and distributing the necessities of life, the members of the cooperatives are producing considerable quantities of clothing and equipment for the army, including small arms, boats, and smokeless charcoal engines which can be used by guerilla forces or troops in the front lines, without attracting the attention of enemy scouts and bombers. In all, 150 different commodities were being produced by the cooperatives in 1941 with a force of 1,500,000 workers. The total value of goods produced monthly amounts to approximately \$15,000,000. Although essentially a war development, the industrial cooperatives are also regarded as a means of improving the standard of living of the people and of creating a firm foundation for post-war reconstruction.

A national congress of the Chinese cooperative movement was held in April 1941 and a 3-year program for the development of cooperatives was adopted. Plans for extending the movement to places where it does not already exist and for increasing and training the membership were important aspects of the program.

THE SOVIET UNION

Little information is available concerning the activities of Russian cooperatives during the war, but an examination of the position which they occupy in the economy of the Soviet Union as a whole is suggestive of the part which they are undoubtedly playing.

Consumers' cooperative societies in the Soviet Union exist only in the rural areas, the cooperatives serving the urban populations having been taken over by the State trade enterprises in 1935. There are in addition significant differences between the Russian cooperatives and those in other countries, largely as a result of their integration in the State economy.

The activities of the consumers' cooperatives have not been confined to distribution. The societies have also engaged in manufacture, operation of bakeries, catering services, kindergartens, sanatoriums, and rest homes. Striking developments in the growth of these societies have taken place within recent years. In 1930 they had 24,000,000 shareholders, as compared with 36,000,000 in 1940, an increase of 50 percent. The share capital rose from 200,000,000 rubles⁴ to 1,400,000,000 rubles during the same period. The number of stores increased from 91,000 in 1931 to 172,000 in 1940, resulting in considerable improvement in the types of services rendered. The total volume of sales in 1930 amounted to 5,000,000,000 rubles as compared with 42,900,000,000 rubles in 1939.

Data on the types of commodities sold are suggestive of the contribution which the societies are making to an improvement in the standard of living in the rural areas. Ten times as much sugar and confectionery products were sold in 1939 as in 1930, 14 times as much

⁴ Ruble—about 50 cents.

soap, and 7 times as much clothing. In 1933 there were 4,800 cooperative bakeries with an annual production of 1,100,000 tons of bread, whereas by 1940 the number of bakeries had grown to 26,500 and the annual production to 5,800,000 tons. Net earnings of the associations in 1940 amounted to 1,200,000,000 rubles.

Perhaps even more essential to the war effort are the activities of the productive cooperatives ("artels") which in 1940 increased their production by 15 percent. Investment in capital equipment reached a total of 550,000,000 rubles in 1940. New associations are constantly being formed; 1,500 new societies were established in the first 9 months of 1940 and approximately 6,000 new workshops.

Before the war these industrial cooperatives concentrated on the production of consumers' goods, such as mechanical refrigerators, laundry and rubber goods, toys and school supplies, cotton and leather goods, and metal substitutes. The objective of the associations is to discover and utilize local supplies and the byproducts of local industries. The 1941 program of the cooperative workshops called for the assembly of tools, mechanical aids, the renovation of premises, and the production of 40,000,000 pairs of shoes, 78,000,000 meters⁵ of cotton goods, and many similar articles.

Cooperatives in the Axis and Occupied Countries

GERMANY

The consumers' cooperative movement in Germany was one of the strongest and most successful in Europe prior to the advent of National Socialism. Even before Hitler's seizure of power, Nazi storm troopers had vehemently attacked the movement, engaging in hoodlumism, window smashing, and bombing. Accordingly little hope was held for the cooperatives following their incorporation into the National Socialist system in 1933. Under a decree issued in that year, the movement was directed to wind up its affairs, further developments were prohibited, and fusion with the Labor Front was authorized. The strength of the cooperatives and the loyalty of their members in spite of continual Nazi attacks are shown by the fact that it took the German Government almost 8 years to effect the complete destruction of the movement, ending with a decree of February 18, 1941. The attempts of the National Socialists to apply the "fuhrer" principle to the cooperative movement were recognized as a failure in official circles, largely because it was found impossible to grant a single individual control over the funds of a society in which each of the members had unlimited liability for the debts of the whole. The authorities admitted that they found it extremely difficult to select proper "fuhrers."

According to the decree of February 18, 1941, all assets, properties, and enterprises of the German cooperatives were to be handed over to the German Labor Front. Included within the scope of the decree was the consumers' movement in the Sudetenland, the German Wholesale Society with headquarters at Hamburg, the Austrian societies affiliated with the Zentralverband, and the Wholesale Society with headquarters in Vienna. From that time cooperative societies

⁵ Meter = 39.37 inches.

ceased to exist in Germany. While in a sense the decree merely gave formal sanction to an accomplished fact, the decision was of grave importance to the millions of low-income families which had relied on the cooperatives for their supplies. The fact that the Government could risk the discontent and resentment of these persons in the midst of war suggests that under Nazi leadership the movement had lost most of its significance and meaning to the members.

Dr. Ley, the leader of the Labor Front, admitted that "the problem of the cooperatives was difficult for National Socialism to solve when it came into power. The worker saw in the cooperative movement something he had created and in which he had invested many millions of capital, as well as million of savings. For this reason we could not have liquidated the cooperatives without causing great disquiet among the broad masses. Besides we saw that important industrial centers, and even entire regions, were dependent on the cooperative distributive system. * * * On the other hand, to let them continue meant undeniable political danger, for their 10,000,000 members were all enemies of National Socialism." Dr. Ley also indicated that the Nazis regarded the cooperative movement as "one of our strongest opponents."

In explaining the conditions of liquidation, the leader of the Labor Front stated that the members' share capital and deposits would be repaid to them—a promise that probably gave small consolation to those who had helped build the societies at great sacrifice and who had an equity in the reserves of enterprise. A second condition of liquidation was that the distributive works of the Konsumverein would be transformed into model enterprises to be utilized as special schools for the training of personnel in the methods of merchandising. Plans for turning the distributive organizations over to soldiers returning to civilian life after the war were outlined. In the words of Dr. Ley, every soldier who has the "interest and inclination to become an efficient merchant and trader will be allotted a retailing establishment by the Labor Front." Thus, a vast network of nonprofit organizations built out of the savings of the cooperators was to be devoted entirely to the requirements of private retailers and veterans of the German army.

The decree of February 18, 1941, was accompanied by an appeal to the cooperative employees on behalf of the new management. The management assured them that the volume of trade would remain unaffected and that their jobs were not threatened. Clerks were specifically requested to do everything possible to explain away "any cause for unrest among the membership."

The lack of German personnel for stores in the occupied countries may have been one of the reasons for liquidation, the war having resulted in eliminating Polish, Jewish, and French personnel from the trading enterprises in Alsace and those parts of Poland which have been incorporated into the German Reich. It was estimated in official circles that some 30,000 stores had changed hands in Poland alone and another 3,000 in the cities of Strasbourg, Colmar, and Mulhouse.

FINLAND

The Finnish cooperatives, which have always been an integral part of the cooperative movement throughout the world (and which re-

ceived considerable aid and sympathy from cooperators in other countries during the war with the Soviet Union) have had their connections severed with the cooperative movement in other parts of the world. When Vainö Tanner, president of the International Cooperative Alliance and one of Finland's leading statesmen, led Finnish cooperatives into war, English cooperators broadcast appeals to the "Nation of Cooperators" in an effort to "prevent their Finnish friends from going over the precipice into full collaboration with Hitler."

LITHUANIA AND ESTONIA

The extent to which the cooperative movement has been subverted to the purposes of the aggressor is clearly seen in Lithuania. Although the Nazis had destroyed the cooperative movement in Germany as an enemy of National Socialism, they conferred monopoly rights upon the Lithuanian cooperatives in order to further their war aims. The important role which cooperatives played in the Lithuanian economy explains the action of the German army of occupation. The Central Union of Agricultural Societies, "Lietukis," aside from its marketing functions formerly sold 85 percent of all the salt, 75 percent of all agricultural machinery, and 70 percent of all the sugar distributed in Lithuania.

The fact that three-fourths of the population was scattered over the country and engaged in agricultural pursuits made the institution of requisitioning and rationing controls extremely difficult. The army of occupation endeavored to overcome the difficulties and enforce its quotas by making use of the records of the cooperative societies, the quotas being based upon the amount which the records indicated the peasants sold through cooperatives before the war. So strict was the monopoly granted to cooperatives that even sales to German soldiers were forbidden.

A strong cooperative movement also existed in Estonia where the cooperatives owned a metal works and foundry, factories which manufactured agricultural machinery, barbed wire, paper products, and tobacco (the latter supplied one-half of the national requirements), etc. Little is known about the results of the German occupation.

POLAND

A policy somewhat analogous to that followed by the German authorities in Lithuania was adopted in Poland, but for different reasons. Apparently, the Polish cooperatives have never been destroyed. The Union of Consumers' Societies ("Spolem"), the Union of Agricultural Societies, and the Union of Dairy Societies continued to operate even after the occupation of Warsaw. "Spolem" was accorded a privileged position with respect to supplies, being allowed to make purchases in Germany proper. Reports indicate that new societies have even been established. This apparent friendliness towards the cooperative movement, which has long been associated with the Polish nationalist movement, was undoubtedly motivated by the desire of the National Socialist authorities to deprive the Jewish population of all means of support, since many of the latter were engaged in trade. In view of the way in which the cooperatives have been subverted to the purposes of the Nazis, it is obvious that they have lost their true cooperative character.

The German army introduced a system of requisitioning and rationing in which the cooperatives were forced to participate. As a result of the occupation of Poland, the country was divided into two parts, the western and wealthier section being incorporated into the Reich. The remainder was forced to provide supplies for its own population and in addition for thousands of refugees from the west. Agricultural cooperative associations were the channel through which the countryside was drained of all its produce under the German program of stimulating forced deliveries. Cooperative stores were allowed to sell to peasants only when they made deliveries of produce at the stipulated prices. In order to make it impossible for the peasants to sell at higher prices to outsiders, private trading enterprises (largely in Jewish hands) were forbidden to replenish their inventories.

NORWAY AND DENMARK

There is relatively little information concerning the effect of the war upon the Norwegian and Danish cooperatives. At the outbreak of hostilities, Norges Kooperative Landsforening (popularly known as N. K. L.) attempted to exert a restraining influence upon prices which began to rise sharply as a result of restrictions on supply and anticipatory buying. In the early period of the war the cooperative movement was apparently affected more by the disruption of economic processes than by the critical political situation.

The German occupation of Norway, preceded by destruction and accompanied by the requisitioning of foodstuffs, resulted in a drastic curtailment of all types of economic activity and affected the very foundations of the cooperative movement. The effect upon the country is clearly seen in the case of bread cereals, 70 percent of which were imported before the war. The output of margarine has ceased and cooperative industries engaged in canning have been forced to close down because of the lack of fuel for the fishing fleet and olive oil and tin for canning. The wholesale sales of N. K. L. amounted to 59,400,000 kroner ⁶ in 1940, which represented a 5-percent decrease from 1939. The actual decrease was probably considerably larger, in view of the fact that the wholesale and retail price indexes showed a 32 and 21 point increase, respectively, during the same period. The mean of the two indexes, which is considered fairly representative of N. K. L.'s commodity structure, suggests a drop of 31 percent in volume. Data for 1941, reflecting the effects of an intensification of the economic situation, imply a considerable drop in physical inventories.

Recent information obtained by Swedish cooperatives indicates that N. K. L. is to be reorganized along the principles of Nasjonal Samling, the Norwegian Nazi Party. The chairman and secretary of N. K. L. who were arrested and sent to a concentration camp have since been released.

THE NETHERLANDS

The cooperative movement in the Low Countries suffered considerable damage from enemy action during the period of invasion. In Rotterdam alone the damage to cooperative property was estimated

⁶ Exchange rate of krone in 1940 = 22.7 cents.

at 670,000 florins.⁷ As a result of this destruction and the difficulty of obtaining commodities (almost everything is sold on ration cards), a sharp drop in cooperative membership was reported. The systematic looting of the country and the demands made upon skilled labor for service in Germany have also had their effect upon the movement.

Early in 1941 the raw-material situation became acute and the output of the textile works at Hengelo, which are owned by the Wholesale Society "Haka," was sufficient to cover the demands of only 1,200,000 ration coupons of the 4,678,555 turned over to it by its affiliated associations.

New fiscal burdens were imposed upon all enterprises, and the profits tax which is based upon the entire receipts (including patronage refunds) was increased from 11.5 percent in 1939 to 31.5 percent in 1940. In addition a pyramided turn-over tax contributed to complicating the business operations as well as to effecting a reduction in the standard of living of the people.

The entire economic system of the Netherlands was reorganized along corporative lines and the "fuhrer" principle was introduced. In view of the previously high standard of living of the Dutch people, the army of occupation attempted to adjust the price level to that prevailing in Germany, in order to eliminate differences in the standard of living.

FRANCE

Little information has been released concerning the fate of the cooperative movement in France with its 2,500,000 members. A policy of "regroupment, unification, and purifying" was adopted in conformity with the plans for reorganizing French economic life along the lines of the corporative principles advocated by Marshal Petain. In the case of the agricultural cooperatives, only three-fifths of the management committees can be elected by the membership, the remaining two-fifths being appointed by the new syndicates whose officers are either appointed or approved by the government.

Nine-tenths of the cooperatives in France were in the territory now occupied by the Germans. The German authorities "have permitted" many of the officers and directors of these cooperatives "to retire."

YUGOSLAVIA

The Yugoslav cooperative movement was shattered when that nation was torn apart and divided among Germany, Italy, and Hungary. Cooperatives in German-occupied Slovenia were completely destroyed and the property and savings of the members confiscated. Directors and managers of cooperative societies were arrested and deported. The fact that entire Provinces were torn asunder and divided among the aggressors resulted in severing many local societies from their central organizations and wholesales. Serbian cooperatives have been "nazified" under the leadership of Zbor, the Serbo Fascist Party. The only exceptions to the general rule are the cooperatives of the German minority which are now being promoted by the authorities.

⁷ Exchange rate of florin in 1939=53.3 cents.

Prior to the war, the cooperative movement in Yugoslavia played an essential role in every aspect of the life of the people; an especially strong branch was organized by employees in the civil service. The societies contributed to improving the standard of living and cultural life of the people in many different ways. Volunteers were sent out into the country to teach reading and writing, and cooperative associations sponsored peasant writers and artists and fostered theater and dance groups.

The improvement of health and cultural conditions was one of their main objectives and a large number of cooperative health plans were in operation before the war. The Croatian Peasant Party promoted two types of cooperatives—the Peasant Concord and the Economic Concord—the first of which was responsible for teaching reading and writing to some 100,000 adult peasants in 1939. The plans for wiping out illiteracy in Croatia by 1942 have probably been abandoned.

The Neutral Nations

SWEDEN

Sweden's essential export trade was brought to a standstill with the invasion of Norway and Denmark in April 1940. Severe governmental regulations and restrictions were quickly adopted, and strenuous efforts were made by the cooperatives to build up reserves of important foodstuffs and raw materials.

Immediately following the invasion of the two Scandinavian nations on the west, the directors of Kooperativa Förbundet ("K. F."), the Swedish Wholesale Society, negotiated a trade treaty with Moscow, which proved of little assistance in view of the subsequent entry of the Soviet Union into the war. The scarcity of essential goods at home led to high prices, rationing, and price regulation (law of June 16, 1941).

With overseas connections broken, imports dropped to an insignificant figure and the efforts of both the Government and the cooperatives were directed at preventing inflationary tendencies from spreading. The principles underlying Sweden's wartime policy were closely related to the theory on which her monetary policy had been based since 1932, being designed to prevent marked increases in the level of retail prices and the cost of living. However, the Government's fiscal program, adopted in 1940, failed to prevent a rapid deterioration in the standard of living. In January 1941 a general turn-over tax was imposed on sales at retail, which further intensified the situation. Although the cooperative movement objected to the tax, it was apparently accepted as a necessary evil.

All of the productive enterprises of the Swedish cooperatives were endangered by the blockade which prevented access to the sources of raw materials. The entire investment policy of the cooperative movement, which was considered one of its great achievements, was threatened, and it became necessary to see that the invested capital was employed as economically as possible. This was partly accomplished by the accumulation of large inventories of raw materials and by rapid conversion of technological processes to meet the new conditions. K. F. urged the abandonment of the peacetime policy of "small inventories, rapid turn-over," and increased its own inventories

by approximately 170 percent while local societies increased theirs by 35 percent. The resourcefulness of the movement in meeting the crucial situation and in providing the nation with raw materials won the praise of the Swedish Minister of Finance.

Despite the difficulties which the local societies faced, in only 2 other years (1916 and 1932) was the influx of new members into the movement greater than during the war years 1939 and 1940. Although amalgamations were responsible for a slight drop in the number of societies in 1940 (717 to 711), the sphere of activity was broadened by the opening of many new stores. It was generally felt that the movement, with its 700,000 families, representing nearly half of the population, exercised a restraining influence on prices. Owing to the loyalty of the members, cooperative sales reached a record volume during the period. The increase in sales was roughly equal to the increase in the official index of food prices, but in view of the differences in the commodity structure of the movement and in the selection of goods in the index, it is improbable that the increase was entirely due to rises in the price level. In many cases cooperative prices were below the average levels, as a result of a definite effort upon the part of the movement to prevent or delay increases.

The entire economic life of Sweden was altered in a dramatic fashion as a result of the shortage of supplies. Arrangements for the purchase of old tires and galoshes were made through local retail societies. As a result of this policy of conserving existing supplies and reworking old materials, the cooperative rubber-goods factory continued to operate and even maintained its 1939 level of production during the year 1940. The executive board of K. F. decided to build a new rubber factory at Gislaved for the sole purpose of reprocessing used rubber. Both the famous "Luma" factory (making electric-light bulbs) and the Swedish Control Register Co. endeavored to adjust themselves to the new situation; the facilities of the former are now used for the production of wolfram and radio tubes. The Karlshamn edible oil plant has been reorganized for the production of fat and fodder; the pottery plant at Gustavsberg has been extended and modernized, and strenuous efforts made to develop a domestic market for its products through the retail societies. The production of artificial wool at the Nordisk Silkcellulosa factory has been trebled.

Energetic managers also took advantage of native inventions and purchased the manufacturing rights for charcoal-burning generators, which made it possible for Swedish automobiles to continue to operate in spite of a serious petroleum shortage. Plans were laid for the erection of a charcoal and substitute-fuel plant at Lycksele. After years of successful experimentation, K. F. decided to build a hardening plant for fish oils (the hardening process neutralizes the taste of fish oil and makes it suitable for use in cooking).

SWITZERLAND

In the middle of 1940, although there were large stocks of goods on hand, Switzerland suddenly found itself cut off from the main sources of supply. Stringent measures were taken in an effort to check prices and restrict consumption. Like Sweden, Switzerland made every effort to control imports and exports and to increase domestic production with a view to attaining as high a degree of self-sufficiency

as possible. However, the deterioration of the economic situation seriously affected the consumers' cooperative movement with its 450,000 members, representing roughly one-half of the population.

Under such conditions, the Central Union and Wholesale Society (Verband schweiz. Konsumvereine) accepted fiscal burdens and governmental restrictions which in normal times it would have fought against with all the means at its disposal.

Among the measures formerly opposed by cooperators but accepted as emergency measures were taxes on turn-over and dividends (refunds in excess of 5 percent of sales are taxed at the rate of 3 percent under the defense taxes imposed in 1940) and restrictions on the opening of new stores. Prior to the war Switzerland had a shop-restriction decree prohibiting the extension of department stores, retail chains, and one-price shops. Cooperatives founded before May 1, 1935, however, were exempt, although the exemption was largely based upon an agreement between the national cooperative organizations and the Swiss National Traders' Union. A decision issued by the Federal Council in April 1941 was even more stringent than the earlier decree and prohibited the opening of any new kind of enterprise except by license.

In some respects the severity of rationing in Switzerland was harsher than the measures adopted in Great Britain, especially in the case of food and clothing. The effects on the Swiss consumers' cooperative movement were obviously far reaching, since these items constituted its main stock in trade. The cooperatives, however, were not caught unaware, having built up considerable inventories of textiles, shoes, rubber goods, and similar products. Three thousand tons of potatoes, vegetables, and fruits were placed in 40 warehouses throughout the country. The ability of the local cooperatives to meet the situation was largely attributable to the strong financial position of V. S. K., which increased its inventories 149 percent during 1940. The sales of approximately 550 affiliated societies increased from 247,083,976 francs in 1940 to 256,682,669 in 1941, but examination of the retail-price index suggests an actual decline in physical volume.⁸

The movement also devoted considerable time and effort to seeing that quality standards were maintained in connection with the price-control orders. During 1940, cooperative laboratories made 14,482 analyses and in only 4.5 percent of the cases were deficiencies in quality found.

⁸ The index of retail food prices (1914=100) rose from 132 in 1939 to 146 in 1940 and reached 185 in October 1941.

SOURCES: This article is based on data from *The People's Yearbook*, 1941 and 1942 (Manchester, England); current issues of *Cooperative Information*, International Labor Office (Montreal, Canada); *Review of International Co-operation* (London); *The Co-operative Official* (Manchester); *Kooperatøren* (Oslo); *Canadian Co-operator* (Brantford, Ontario); *La Coopération* (Basel); *The Midland Cooperator* (Minneapolis); *Cooperative Consumer* (North Kansas City, Mo.); *Cooperative Builder* (Superior, Wis.); *Co-operative League News Service* (New York); *Consumers' Cooperation* (New York); various issues of *International Labor Review*; *Bulletin of Institute of Statistics* (Oxford); *The Economist* (London); *Free America*; *The Washington Post*; *The Washington Star*; *The New York Times*; and U. S. Bureau of Foreign and Domestic Commerce, *Foreign Commerce Weekly*; *Consumers' Cooperation under the Nazi Regime* (New York); and *Britain's Food Supplies in Peace and War*, by Charles Smith (London, 1940).

Cost and Standards of Living

CHANGES IN COST OF LIVING IN LARGE CITIES, JULY 15, 1942

LIVING costs in large cities rose 0.4 percent between June 15 and July 15 (i. e., the second month of general price control). Prices of unregulated goods and services advanced 1.6 percent while controlled items increased 0.1 percent. The most important advances occurred in unregulated foods. These increases were largely seasonal in character. Among the controlled items the most important increases were in prices of gasoline and fuel oil in Eastern cities, allowed because of higher transportation costs. Rents in a number of cities were reduced as they were brought under Federal control. These, together with a few food prices, were the only important decreases.

The recent advance brings the Bureau of Labor Statistics cost-of-living index to 116.9 percent of the 1935-39 average. Costs on July 15, 1942, were 11 percent higher than on July 15, 1941. By mid-July, families of wage earners and lower-salaried workers had to spend \$1.19 to buy the same things for which they spent \$1.00 before the outbreak of the war in August 1939.

Retail costs of food advanced 1.1 percent between mid-June and mid-July. This was due, for the most part, to seasonal advances in retail prices of eggs, butter, lamb, and poultry and higher prices for fresh milk, meats, and certain fresh vegetables. The increase in food costs for the average worker's family was slightly less than for the previous month—mid-May to mid-June—when the rise was 1.3 percent.

Prices of foods not under the General Maximum Price Regulation continued to advance, rising 2.5 percent. Eggs and butter, as well as certain fresh fruits and vegetables such as oranges, lettuce, spinach, and sweet potatoes, showed their usual seasonal rise. Advances were also reported for grapefruit, dried prunes, and corn meal. Prices were higher for green beans, carrots, and potatoes, which usually decrease at this time. Cabbage and onions were seasonally lower. Prices of apples, which had a sharp seasonal rise from mid-May to mid-June, declined 9 percent as the new crop began to be marketed. Prices for wheat flour were also reduced.

Controlled food prices rose slightly—0.3 percent—as a result of higher prices for fresh milk in Chicago and New York and for beverages and certain meats. Other controlled foods for which increases were reported included canned fruits, shortening in cartons, corn syrup, rolled oats, vanilla cookies, and soda crackers. The increase for corn syrup is partly due to a change from tin to glass containers. Prices for macaroni, whole wheat bread, bananas, shortening not in cartons, sugar, and canned vegetables were lower.

Rental costs to moderate-income families declined, on the average, 0.7 percent, with the initiation of Federal control in eight additional

cities. Of the 21 cities in which rents were surveyed, 13 were under Federal rent control. The sharpest decline, 6.9 percent, occurred in Baltimore where the regulation provides that rents be returned to the level of April 1, 1941. In the other cities, the ceiling order was based on a more recent date, March 1, 1942. Small decreases were noted in other cities which have been designated as "defense rental areas," but where Federal control has not yet been formally instituted. A slight increase was reported in Washington where rents have been controlled under a special law since the beginning of 1942, and in Los Angeles where rents are not yet under Federal control.

Clothing costs remained stable, reflecting the effect of the General Maximum Price Regulation. In a few instances, increases were reported in prices of men's wool suits and in work shoes, but the Bureau's agents reported that these increases were largely due to a return to regular prices after sales in June. Dry-cleaning charges were lowered in several cities, as a result of the imposition of the ceiling by the Office of Price Administration on July 1.

Although all housefurnishings are under price ceilings, increases in prices were reported in several cities, resulting in a slight increase of 0.1 percent. There were several reasons for the rise, among them, prices returned to ceiling levels and discounts discontinued. Electrical equipment is no longer available to civilians in most cities.

Prices of fuel oil increased in cities in the Eastern States, as retailers were allowed an adjustment to cover increased transportation charges. Advances were reported in coal and coke prices in some cities. Rates for gas and electricity remained stable in all cities surveyed except Boston, where there was a rise in the cost of gas due to an adjustment for fuel costs.

Average costs for other goods and services advanced 0.1 percent. The rise was due in most part to increases in gasoline prices allowed retailers in the East on June 27 because of higher transportation costs. (This increase was rescinded early in August.) In a few cities, laundry prices were reduced following ceilings imposed on July 1, but increases in laundry prices were reported from several other cities.

TABLE 1.—Percent of Change in Cost of All Goods Purchased by Wage Earners and Lower-Salaried Workers in Large Cities Over Specified Periods

Area and city	Percent of change from—		Area and city	Percent of change from—	
	July 15, 1941, to July 15, 1942	Dec. 15, 1940, to July 15, 1942		July 15, 1941, to July 15, 1942	Dec. 15, 1940, to July 15, 1942
Average: Large cities.....	+11.0	+16.1	West North Central:—Con.		
New England: Boston.....	+11.6	+16.9	Minneapolis.....	+9.2	+13.6
Middle Atlantic:			St. Louis.....	+11.1	+15.0
Buffalo.....	+11.9	+18.8	South Atlantic:		
New York.....	+9.9	+14.2	Baltimore.....	+11.2	+17.7
Philadelphia.....	+12.2	+17.4	Savannah.....	+13.1	+19.7
Pittsburgh.....	+9.9	+15.4	Washington, D. C.....	+11.5	+16.8
East North Central:			East South Central: Birming-		
Chicago.....	+9.3	+14.9	ham.....	+9.5	+15.0
Cincinnati.....	+11.7	+17.2	West South Central: Houston.	+11.1	+14.2
Cleveland.....	+10.6	+16.2	Mountain: Denver.....	+11.6	+15.8
Detroit.....	+10.0	+16.7	Pacific:		
West North Central:			Los Angeles.....	+13.4	+17.3
Kansas City.....	+11.3	+15.3	San Francisco.....	+11.7	+16.2
			Seattle.....	+11.3	+17.2

TABLE 2.—Percent of Change from June 15 to July 15, 1942, in Cost of Goods Purchased by Wage Earners and Lower-Salaried Workers in Large Cities, By Groups of Items

Area and city	All items	Food	Clothing	Rent	Fuel, electricity, and ice	House-furnishings	Miscellaneous
Average: Large cities.....	+0.4	¹ +1.1	(²)	³ -0.7	⁴ +1.2	⁵ +0.1	⁶ +0.1
New England: Boston.....	+1.7	+2.3	+0.1	-1	+7.3	-3	+6
Middle Atlantic:							
Buffalo.....	-1	+4	-1	-1.1	(⁵)	+2	-1
New York.....	+9	+2.0	-1	-1	+7	(⁵)	+2
Philadelphia.....	+1.2	+2.7	(⁵)	(⁵)	+1	(⁵)	+4
Pittsburgh.....	-2	-5	+6	-1.1	(⁵)	+1.6	+5
East North Central:							
Chicago.....	-3	+6	+3	-2.5	-1	+1	(⁵)
Cincinnati.....	-1	-1	-2	-2	(⁵)	(⁵)	-1
Cleveland ⁶	-3	-5	(⁵)	(⁵)	+1	-2	-1
Detroit ⁷	-2	+4	-2	-1.3	+2	(⁵)	-2
West North Central:							
Kansas City.....	-4	-6	-2	-2	(⁵)	-4	-2
Minneapolis.....	+2	+6	-4	(⁵)	+3	+6	-3
St. Louis.....	-3	+1	(⁵)	-2.2	(⁵)	-1	-2
South Atlantic:							
Baltimore.....	-8	+9	-1	-6.9	+4	(⁵)	+5
Savannah.....	+1.1	+2.0	-1	-1	+1.2	(⁵)	+9
Washington, D. C.....	+8	+1.7	(⁵)	+1	+1.1	-2	+7
East South Central: Birmingham ⁸	+1	+2	-1	(⁵)	(⁵)	+2	-1
West South Central: Houston.....	+9	+2.6	-1	(⁵)	+1	(⁵)	-1
Mountain: Denver.....	+3	+6	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)
Pacific:							
Los Angeles.....	+1.1	+2.9	-2	+1	(⁵)	-2	-1
San Francisco.....	+2	+4	(⁵)	(⁵)	(⁵)	+3	-1
Seattle ⁹	+3	+1.2	-1.6	-1	+1	+3	-1

¹ Based on data for 51 cities.² No change; based on data for 21 cities.³ Based on data for 21 cities.⁴ Based on data for 34 cities.⁵ No change.⁶ Indexes for June 15 revised: All items 118.8, rent 112.0.⁷ Indexes for June 15 revised: All items 118.0, rent 112.5.⁸ Indexes for June 15 revised: All items 117.1, rent 120.4.⁹ Indexes for May 15 revised: All items 121.2, rent 122.4.

Indexes for June 15 revised: All items 119.2, rent 111.0.

TABLE 3.—Indexes of Cost of Goods Purchased by Wage Earners and Lower-Salaried Workers in Large Cities, by Groups of Items, July 15, 1942

[Average 1935-39=100]

Area and city	All items	Food	Clothing	Rent	Fuel, electricity, and ice	House-furnishings	Miscellaneous
Average: Large cities.....	116.9	¹ 124.6	² 125.3	³ 107.7	⁴ 106.3	⁵ 122.4	⁶ 111.0
New England: Boston.....	115.8	122.6	121.8	104.9	120.8	118.0	109.3
Middle Atlantic:							
Buffalo.....	120.8	127.8	127.1	114.2	103.6	126.1	118.7
New York.....	115.2	122.8	125.4	103.0	105.3	118.5	110.5
Philadelphia.....	116.3	122.9	126.0	106.7	103.6	121.6	111.4
Pittsburgh.....	116.7	124.1	126.9	107.6	108.4	123.4	110.3
East North Central:							
Chicago.....	116.0	122.8	120.8	112.7	103.5	119.7	110.3
Cincinnati.....	116.7	124.2	128.0	104.7	103.1	125.7	110.6
Cleveland.....	118.5	126.7	127.2	112.0	112.1	123.5	110.4
Detroit.....	117.8	125.0	125.5	111.0	106.9	121.0	113.2
West North Central:							
Kansas City.....	113.7	118.3	122.3	108.4	106.0	116.7	110.5
Minneapolis.....	116.1	122.1	124.0	109.5	98.9	124.1	114.4
St. Louis.....	116.2	126.0	126.9	106.1	106.2	116.1	109.0
South Atlantic:							
Baltimore.....	118.3	128.3	125.8	105.9	104.2	127.7	111.3
Savannah.....	121.5	132.0	126.9	114.9	107.5	120.1	114.1
Washington, D. C.....	116.4	125.3	132.0	100.7	103.9	128.9	113.9
East South Central: Birmingham.....	117.2	121.2	126.4	120.4	99.5	119.3	111.6
West South Central: Houston.....	116.7	128.2	126.6	108.6	93.1	122.5	109.6
Mountain: Denver.....	116.0	124.4	123.2	109.1	99.1	122.0	110.7
Pacific:							
Los Angeles.....	119.9	133.6	127.0	110.0	94.2	118.2	112.0
San Francisco.....	118.1	126.6	125.5	106.4	94.0	119.6	115.3
Seattle.....	119.5	130.9	126.8	110.9	100.7	119.5	113.3

¹ Based on data for 51 cities.² Based on data for 21 cities.³ Based on data for 34 cities.

TABLE 4.—Indexes of Cost of Goods Purchased by Wage Earners and Lower-Salaried Workers in Large Cities, by Years 1935-41, by Months January 1941-July 1942
[Average 1935-39=100]

Year	All items	Food	Clothing	Rent	Fuel, electricity, and ice	House-furnishings	Miscellaneous
1935	98.1	100.4	96.8	94.2	100.7	94.8	98.1
1936	99.1	101.3	97.6	96.4	100.2	96.3	98.7
1937	102.7	105.3	102.8	100.9	100.2	104.3	101.0
1938	100.8	97.8	102.2	104.1	99.9	103.3	101.5
1939	99.4	95.2	100.5	104.3	99.0	101.3	100.7
1940	100.2	96.6	101.7	104.6	99.7	100.5	101.1
1941	105.2	105.5	106.5	105.9	102.5	108.2	104.0
Jan. 15	100.8	97.8	100.7	105.0	100.8	100.1	101.9
Feb. 15	100.8	97.9	100.4	105.1	100.6	100.4	101.9
Mar. 15	101.2	98.4	102.1	105.1	100.7	101.6	101.9
Apr. 15	102.2	100.6	102.4	105.4	101.0	102.4	102.2
May 15	102.9	102.1	102.8	105.7	101.1	103.2	102.5
June 15	104.6	105.9	103.3	105.8	101.4	105.3	103.3
July 15	105.3	106.7	104.8	106.1	102.3	107.4	103.7
Aug. 15	106.2	108.0	106.9	106.3	103.2	108.9	104.0
Sept. 15	108.1	110.7	110.8	106.8	103.7	112.0	105.0
Oct. 15	109.3	111.6	112.6	107.5	104.0	114.4	106.9
Nov. 15	110.2	113.1	113.8	107.8	104.0	115.6	107.4
Dec. 15	110.5	113.1	114.8	108.2	104.1	116.8	107.7
1942							
Jan. 15	112.0	116.2	116.1	108.4	104.3	118.2	108.5
Feb. 15	112.9	116.8	119.0	108.6	104.4	119.7	109.4
Mar. 15	114.3	118.6	123.6	108.9	104.5	121.2	110.1
Apr. 15	115.1	119.6	126.5	109.2	104.3	121.9	110.6
May 15	116.0	121.6	126.2	109.9	104.9	122.2	110.9
June 15	116.4	123.2	125.3	108.5	105.0	122.3	110.9
July 15	116.9	124.6	125.3	107.7	106.3	122.4	111.0



ESTIMATED INTERCITY DIFFERENCES IN COST OF LIVING, JUNE 15, 1942

TO COMPARE the cost of living in different cities of the country, a standard budget has been established by the Works Progress Administration in order to measure the cost of approximately the same level of living, and to avoid differences due entirely to variations in income and in local habits and customs. The figures presented in the attached tables give a comparison based upon this standard budget, at a "maintenance" level for 33 cities.

This is not an official budget of the Department of Labor, nor does it represent a recommended standard of living. It was prepared and its cost in 59 cities in March 1935 computed by the Division of Social Research of the Works Progress Administration. Since 1939, the figures have been kept up to date by the Bureau of Labor Statistics. For this purpose, the Bureau has utilized its regularly reported changes in retail prices in various cities to estimate changes in the cost of this standard budget each quarter. Comparisons of the cost of such a budget can yield only approximate figures on differences in living costs between cities.

The family budget devised by the Works Progress Administration in 1935 is made up of a list of goods and services which they estimated were needed by a 4-person family of an unskilled manual worker living at the "maintenance level." The maintenance level is described as above the "minimum of subsistence level" or "emergency level" of relief budgets, but below the standard of the skilled worker. It is stated that it does not "approach the content of what may be considered a satisfactory American standard of living."

Salaried
1942

Miscellaneous

98.1
98.7
101.0
101.5
100.7
101.1
104.0
101.9
101.9
101.9
102.2
102.5
103.3
103.7
104.0
105.0
106.9
107.4
107.7108.5
109.4
110.1
110.6
110.9
110.9
111.0

T OF

try, a
admin-
e level
income
he at-
get, atr does
d and
Social
0, the
istics.
anges
of this
uch a
livingration
mated
living
ed as
el" of
It is
e con-

The hypothetical family for which the budget was prepared is made up, according to the Works Progress Administration, of a moderately active man who wears overalls at work, his wife, a boy age 13, and a girl age 8. No household help is employed. The family lives in a four- or five-room house or apartment with an indoor bath and toilet; has gas, electricity, and a small radio; uses ice for refrigeration; and has no automobile. They read a daily newspaper and go to the movies once a week. Their food is an "adequate diet at minimum cost." They pay for their own medical care. No savings other than life insurance are provided.

An identical list of goods and services was priced in each of the 59 cities for which the study was made in 1935, with certain adjustments in fuel, ice, and transportation to take account of climatic and other local conditions. The Bureau of Labor Statistics of the United States Department of Labor cooperated with the Division of Social Research of the Works Progress Administration in obtaining prices necessary to compute the original cost of the budget in 1935. Details of this study and a description of the goods and services included in the budget¹ can be found in the report, "Intercity Differences in Cost of Living in March 1935, 59 Cities," Research Monograph XII, a copy of which may be obtained from the Division of Research, Work Projects Administration, Washington, D. C.

The budget has never been completely repriced since 1935. In December 1938,² the budget was in part priced again in almost all of the cities and the food cost budget was entirely recomputed in terms of the "adequate diet at minimum cost" of the United States Bureau of Home Economics (a somewhat more varied diet than that originally used in the "maintenance" budget). At each quarter the food cost is recomputed in this manner; for other parts of the budget, the current cost is estimated by assuming the same changes as recorded in the Bureau's regular indexes of changes in living costs from time to time.³ These indexes are based on a budget composed of different qualities of goods and having different relative importance in the total budget than the Works Progress Administration "maintenance" budget. Because of these differences, the cost figures resulting from application of the cost-of-living indexes to the "maintenance" budget are merely approximations to the actual current cost of that budget.

In view of the changes in buying habits, particularly during the last 2 years, the "maintenance" budget as defined in 1935 is not entirely applicable to present situations. The figures are presented, however, for the convenience of those who find them useful, and in the absence of any better measure of comparison of living costs between cities.

Table 1 shows the estimated dollar cost of the "maintenance" budget in 33 large cities as of June 15, 1942. Table 2 presents these data as relatives on a base of the cost in Washington, D. C., at that date as 100.

¹ The report also includes details of a more restricted budget at an "emergency" level. That budget has not been kept up to date by the Bureau of Labor Statistics.

² A study of "Differences in Living Costs in Northern and Southern Cities" was made at the request of the Wage and Hour Division. The July 1939 Monthly Labor Review carries an article describing the survey.

³ The Bureau's indexes of changes in living costs from time to time measure changes in the cost of a budget representing actual family expenditures of a cross section of employed wage earners and clerical workers in each of 34 cities. Since these budgets are different in each city, depending on incomes, local habits, etc., indexes based on them cannot be used to compare living costs between cities. Further information about these indexes may be found in Bulletin 699, "Changes in Cost of Living in Large Cities in the United States, 1913-41," and monthly mimeographed reports issued by the Bureau of Labor Statistics.

TABLE 1.—Estimated¹ Cost of Living for a Four-Person Manual Worker's Family at Maintenance Level (as Defined by WPA),² in 33 Large Cities, June 15, 1942

City	Total	Food	Clothing	Housing	Fuel and light	Furniture, furnishings, household equipment	Miscellaneous
Atlanta.....	\$1,535.10	\$593.34	\$196.30	\$291.25	\$96.18	\$36.59	\$321.44
Baltimore.....	1,554.06	593.14	206.74	271.68	106.39	44.62	331.49
Birmingham.....	1,493.65	587.10	212.07	241.54	74.27	38.15	340.52
Boston.....	1,633.02	590.55	205.05	272.06	146.74	39.21	379.41
Buffalo.....	1,557.45	588.33	212.77	261.78	113.61	40.43	340.53
Chicago.....	1,677.61	599.97	192.76	309.74	133.15	38.39	403.60
Cincinnati.....	1,567.42	592.98	219.17	275.50	98.74	43.61	337.42
Cleveland.....	1,625.18	590.71	220.71	290.76	115.72	40.46	366.82
Denver.....	1,501.97	571.54	201.55	243.27	114.18	39.26	332.17
Detroit.....	1,672.70	595.10	208.60	318.13	122.80	38.23	389.84
Houston.....	1,491.07	562.02	197.62	249.11	85.48	40.82	356.02
Indianapolis.....	1,527.95	576.20	195.44	262.93	99.74	40.48	353.16
Jacksonville.....	1,543.46	611.46	183.02	249.51	111.97	39.49	348.01
Kansas City.....	1,454.57	565.07	207.02	220.81	111.69	38.94	311.04
Los Angeles.....	1,541.20	570.67	209.02	250.11	71.07	41.11	399.22
Manchester.....	1,576.89	621.52	194.90	200.01	171.54	39.15	349.77
Memphis.....	1,542.60	572.91	224.66	286.64	89.71	42.82	325.86
Milwaukee.....	1,611.07	575.80	175.28	310.60	128.10	38.20	383.09
Minneapolis.....	1,615.02	584.54	200.82	309.84	139.96	38.56	341.30
Mobile.....	1,405.86	593.65	195.80	194.67	82.53	40.16	299.05
New Orleans.....	1,486.24	602.14	204.36	214.46	70.66	44.63	349.99
New York.....	1,695.03	629.22	205.81	310.73	122.94	41.29	385.04
Norfolk.....	1,594.71	616.00	217.08	261.94	111.57	41.88	346.24
Philadelphia.....	1,543.75	591.76	210.59	265.09	106.02	39.70	330.59
Pittsburgh.....	1,594.09	603.49	206.51	295.66	94.85	40.42	353.16
Portland, Maine.....	1,591.37	618.24	204.93	212.59	162.32	39.77	353.52
Portland, Oreg.....	1,588.71	623.22	194.14	211.08	152.58	40.99	366.70
Richmond.....	1,540.80	568.60	212.34	255.89	108.52	42.26	353.19
St. Louis.....	1,615.54	607.47	201.07	303.08	114.13	43.02	346.77
San Francisco.....	1,684.05	613.57	210.20	293.16	87.08	43.58	436.46
Scranton.....	1,569.39	604.24	201.22	265.51	98.26	39.81	360.35
Seattle.....	1,607.42	621.70	213.92	204.18	128.11	42.47	397.04
Washington, D. C.....	1,704.78	596.15	221.02	352.81	118.89	44.29	371.62

¹ See explanation of method given on pages 570 and 571.² See the Works Progress Administration publication, "Intercity Differences in Costs of Living in March 1935, 59 Cities," Research Monograph XII, for the items included in the maintenance budget.

TABLE 2.—*Estimated¹ Indexes of Cost of Living for a Four-Person Manual Worker's Family at Maintenance Level² in 33 Large Cities, June 15, 1942*

[Cost in Washington, D. C., June 15, 1942=100]

City	Total	Food	Clothing	Housing	Fuel and light	Furniture, furnishings, household equipment	Miscellaneous
Atlanta.....	90.0	99.5	88.8	82.6	80.9	82.6	86.5
Baltimore.....	91.2	99.5	93.5	77.0	89.5	100.7	89.2
Birmingham.....	87.6	98.5	96.0	68.5	62.5	86.1	91.6
Boston.....	95.8	99.1	92.8	77.1	123.4	88.5	102.1
Buffalo.....	91.4	98.7	96.3	74.2	95.6	91.3	91.6
Chicago.....	98.4	100.6	87.2	87.8	112.0	86.7	108.6
Cincinnati.....	91.9	99.5	99.2	78.1	83.1	98.5	90.8
Cleveland.....	95.3	99.1	99.9	82.4	97.3	91.4	98.7
Denver.....	88.1	95.9	91.2	69.0	96.0	88.6	89.4
Detroit.....	98.1	99.8	94.4	90.2	103.3	86.3	104.9
Houston.....	87.5	94.3	89.4	70.6	71.9	92.2	95.8
Indianapolis.....	89.6	96.7	88.4	74.5	83.9	91.4	95.0
Jacksonville.....	90.5	102.6	82.8	70.7	94.2	89.2	93.6
Kansas City.....	85.3	94.8	93.7	62.6	93.9	87.9	83.7
Los Angeles.....	90.4	95.7	94.6	70.9	59.8	92.8	107.4
Manchester.....	92.5	104.3	88.2	56.7	144.3	88.4	94.1
Memphis.....	90.5	96.1	101.6	81.2	75.5	96.7	87.7
Milwaukee.....	94.5	96.6	79.3	88.0	107.7	86.2	103.1
Minneapolis.....	94.7	98.1	90.9	87.8	117.7	87.1	91.8
Mobile.....	82.5	99.6	88.6	55.2	69.4	90.7	80.5
New Orleans.....	87.2	101.0	92.5	60.8	59.4	100.8	94.2
New York.....	99.4	105.5	93.1	88.1	103.4	93.2	103.6
Norfolk.....	93.5	103.3	98.2	74.2	93.8	94.6	93.2
Philadelphia.....	90.6	99.3	95.3	75.1	89.2	89.6	89.0
Pittsburgh.....	93.5	101.2	93.4	83.8	79.8	91.3	95.0
Portland, Maine.....	93.3	103.7	92.7	60.3	136.5	89.8	95.1
Portland, Oreg.....	93.2	104.5	87.8	59.8	128.3	92.5	98.7
Richmond.....	90.4	95.4	96.1	72.5	91.3	95.4	95.0
St. Louis.....	94.8	101.9	91.0	85.9	96.0	97.1	93.3
San Francisco.....	98.8	102.9	95.1	83.1	73.2	98.4	117.4
Scranton.....	92.1	101.4	91.0	75.3	82.6	89.9	97.0
Seattle.....	94.3	104.3	96.8	57.9	107.8	95.9	106.8
Washington, D. C.....	100.0	100.0	100.0	100.0	100.0	100.0	100.0

¹ See explanation of method on pages 570 and 571.² See the Works Progress Administration, Research Monograph XII (Intercity Differences in Cost of Living in March 1935, 59 Cities), for items included in maintenance budget.

Industrial Disputes

RECENT STRIKES

IDLENESS during strikes in July 1942 decreased about 18 percent as compared with June, and the number of workers involved in new strikes during the month decreased 12½ percent, although the number of strikes increased about 14 percent. Strike activity during July was below the level of activity in July 1941—the number of new strikes was 9 percent less, the number of workers involved in new strikes was 39 percent less, and idleness during strikes was 66 percent less. It is estimated that strike idleness during July amounted to 0.07 percent of the available working time.

Idleness during strikes affecting war work declined about 8 percent in July as compared with June, and the number of workers involved in war strikes was 5 percent less, although the number of new strikes affecting war work was nearly 16 percent greater than in June.

Trend of Strikes, January to July 1942

Month	All strikes ¹			Strikes affecting war work ²		
	Number of strikes beginning in month	Number of workers involved	Number of man-days idle	Number of strikes beginning in month	Number of workers involved	Number of man-days idle
1942						
January.....	155	32,500	390,000	27	11,605	46,197
February.....	190	57,000	425,000	50	24,587	118,700
March.....	240	65,000	450,000	66	34,957	166,680
April.....	310	55,000	375,000	91	26,255	173,513
May.....	275	58,000	325,000	125	44,891	137,230
June.....	350	100,000	550,000	171	78,627	254,653
July.....	400	87,500	450,000	198	74,812	233,614

¹ Figures are not final but are subject to change as later information is received.

² As determined by a Joint Committee of representatives from the War, Navy, and Labor Departments, Maritime Commission, War Labor Board, and War Production Board. The Bureau of Labor Statistics does not participate in the selection of these strikes, but it does furnish the statistics after the Joint Committee determines which strikes affected war work.

The largest strike in July, in terms of number of workers involved, was at the Berwick, Pa., plant of the American Car & Foundry Co., where more than 8,000 workers were idle for 1 day and some of them 2 days, in protest against the discharge of three union members. Work was resumed after the second day, pending further negotiations, and the discharged men were reinstated. Among the other larger strikes in July were (1) the 1-day stoppage, July 31, involving more than 5,000 workers of the Pontiac Motor Division of the General Motors Corporation at Pontiac, Mich., owing to the picketing of the plant by workers involved in a dispute with the Oakland County Food Dealers

Association; (2) the 2-day strike, July 21 and 22, of about 3,000 truck drivers in St. Louis, Mo., for a wage increase, which was terminated with a resumption of work pending further negotiations on the wage issue; and (3) the 3-day strike involving more than 2,800 employees of the Electric Storage Battery Co. in Philadelphia and Crescentville, Pa., over distribution of work in the interest of employees with seniority rights. This strike was settled by representatives of the company and the union; United Electrical Radio and Machine Workers of America (C. I. O.), without the intervention of any Government agency.

ACTIVITIES OF THE UNITED STATES CONCILIATION SERVICE, JULY 1942

THE United States Conciliation Service, during July disposed of 1,301 situations involving 954,010 workers (table 1). The services of this agency were requested by the employers, employees, and other interested parties. Of these situations, 174 were strikes and lock-outs involving 72,500 workers; 736 were threatened strikes and controversies involving 606,347 workers. Seventy-five disputes were certified during the month to the National War Labor Board, and jurisdiction was assumed by other agencies in 59 others. The remaining 257 situations included investigations, arbitrations, requests for information, consultations, etc.

The facilities of the Service were used in 28 major industrial fields, such as building trades, and the manufacture of foods, iron and steel, textiles, etc. (table 2), and were utilized by employees and employers in 46 States, the District of Columbia, Alaska, and Puerto Rico (table 3).

TABLE 1.—Situations Disposed of by United States Conciliation Service, July 1942, by Type of Situation

Type of situation	Number	Workers involved
All situations handled.....	1,301	954,010
Disputes.....	910	678,847
Strikes.....	170	71,750
Threatened strikes.....	262	161,610
Lock-outs.....	4	750
Controversies.....	474	444,737
Other situations.....	257	46,184
Investigations.....	72	22,915
Technical services.....	16	6,055
Arbitrations.....	75	10,893
Requests to conduct consent elections.....	4	88
Requests for verification of union membership.....	2	95
Requests for information.....	6	8
Consultations.....	62	204
Special services of commissioners.....	10	5,910
Complaints.....	10	16
Disputes referred to other agencies during negotiations.....	134	228,979
To National War Labor Board.....	75	184,218
To National Labor Relations Board.....	42	21,575
To other Federal agencies.....	5	2,969
To Wage Adjustment Board.....	3	14,500
To nongovernmental agencies.....	7	5,542
To State agencies.....	2	175

TABLE 2.—Situations Disposed of by United States Conciliation Service, July 1942, by Industries

Industry	Disputes		Other situations		Total	
	Num-ber	Workers involved	Num-ber	Workers involved	Num-ber	Workers involved
All industries.....	1,044	907,826	257	46,184	1,301	954,010
Agriculture.....	1	43			1	43
Automobile.....			1	200	1	200
Building trades.....	98	171,637	25	11,093	123	182,730
Chemicals.....	39	9,676	6	658	45	10,334
Communications.....	8	61,081	1	66	9	61,147
Domestic and personal.....	29	4,007	11	912	40	4,919
Electrical equipment.....	37	100,038	4	676	41	100,714
Food.....	105	135,904	20	2,497	125	138,401
Furniture and finished lumber.....	35	5,484	4	486	39	5,970
Iron and steel.....	164	112,039	37	3,851	201	115,890
Leather.....	16	4,776	13	1,666	29	6,442
Lumber.....	29	23,711	6	106	35	23,817
Machinery.....	49	42,509	12	4,482	61	46,991
Maritime.....	15	4,317	2	10	17	4,327
Mining.....	9	1,229			9	1,229
Nonferrous.....	58	28,819	9	522	67	29,341
Paper.....	12	7,190	2	328	14	7,518
Petroleum.....	14	9,111	7	103	21	9,214
Printing.....	11	514	1	1	12	515
Professional.....	1	124			1	124
Rubber.....	5	716	1	24	6	740
Stone, clay, and glass.....	40	6,774	6	4,029	46	10,803
Textile.....	58	30,203	25	4,800	83	35,003
Tobacco.....	3	1,205			3	1,205
Trade.....	54	17,181	19	1,577	73	18,758
Transportation.....	51	28,967	15	2,362	66	16,398
Transportation equipment.....	64	94,102	13	4,169	77	113,202
Utilities.....	10	3,354	5	174	15	3,528
Unclassified.....	29	3,115	12	1,392	41	4,507

TABLE 3.—Situations Disposed of by United States Conciliation Service, July 1942, by States

State	Disputes		Other situations		Total	
	Num-ber	Workers involved	Num-ber	Workers involved	Num-ber	Workers involved
All States.....	1,044	907,826	257	46,184	1,301	954,010
Alabama.....	14	4,678	3	68	17	4,746
Alaska.....	1	700			1	700
Arizona.....	4	1,129	1	2	5	1,131
Arkansas.....	6	1,405			6	1,405
California.....	106	56,041	14	1,396	120	57,437
Colorado.....	8	10,250	3	1,087	11	11,337
Connecticut.....	13	8,194	4	200	17	8,394
Delaware.....	4	1,573			4	1,573
District of Columbia.....	14	11,441	9	651	23	12,092
Florida.....	25	6,634	3	116	28	6,750
Georgia.....	6	2,098	5	11,352	11	13,450
Idaho.....	4	110			4	110
Illinois.....	78	40,395	18	2,257	96	42,652
Indiana.....	23	15,594	9	1,406	32	17,000
Iowa.....	7	1,045			7	1,045
Kansas.....	10	1,932	1	175	11	2,107
Kentucky.....	11	6,499	1	102	12	6,601
Louisiana.....	24	11,120	3	11	27	11,131
Maine.....	4	4,030	3	232	7	4,262
Maryland.....	8	18,597	3	671	11	19,268
Massachusetts.....	25	10,740	21	2,322	46	13,062
Michigan.....	93	55,181	14	3,677	107	58,858
Minnesota.....	23	10,026	2	111	25	10,137
Mississippi.....	8	4,470	1	120	9	4,590
Missouri.....	36	30,867	3	521	39	31,388
Montana.....	7	713	2	475	9	1,188
Nebraska.....	5	362	3	5	8	367
Nevada.....	4	1,225			4	1,225
New Hampshire.....	7	6,205			7	6,205
New Jersey.....	28	44,495	3	25	31	44,520
New Mexico.....	5	1,524			5	1,524
New York.....	79	273,814	16	2,078	95	275,892
North Carolina.....	16	6,035	1	8	17	6,043
Ohio.....	112	53,435	40	4,632	152	58,067
Oklahoma.....	6	158	2	634	8	792
Oregon.....	22	14,655	6	411	28	15,066
Pennsylvania.....	72	37,672	28	3,658	100	41,330
Puerto Rico.....	6	107,326	2	9	8	107,335
Rhode Island.....	9	7,307	2	530	11	7,837
South Carolina.....			3	64	3	64
South Dakota.....	2	337			2	337
Tennessee.....	23	7,151	5	4,144	28	11,295
Texas.....	18	5,182	6	959	24	6,141
Utah.....	6	3,197	3	49	9	3,246
Virginia.....	10	3,101	2	5	12	3,106
Washington.....	24	10,862	8	1,496	32	12,358
West Virginia.....	2	3,030	2	254	4	3,284
Wisconsin.....	26	5,291	1	270	27	5,561
Wyoming.....			1	1	1	1

Wage and Hour Statistics

EARNINGS IN MANUFACTURE OF OIL-FIELD MACHINERY, FEBRUARY-MARCH 1942¹

Summary

DURING the first 3 months of 1942, 11 of the 42 plants included in the Bureau's survey of the oil-field-machinery industry were producing direct war materials for which many of them were not formerly equipped. In none of the plants, however, did the output consist entirely of war materials.

The number of employees in the industry increased approximately 60 percent from the summer of 1939, and average earnings, which were nearly 72 cents at that time, had risen to 83 cents by the spring of 1942. As these earnings include overtime pay at premium rates, they were considerably affected by the increase in the industry's workweek, which rose more than 7 hours since late 1939. Average hourly earnings, exclusive of overtime premiums, are estimated at 77.6 cents during February-March 1942.

Over 21 percent of the male workers included in the survey were classified in the 15 occupational groups which showed average hourly earnings in excess of \$1. Apart from learners, apprentices, and helpers, the only occupational groups with hourly averages below 50 cents were foundry and general laborers and watchmen. The relatively high wage levels prevailing in California plants appear to be due in part to the large average size of the plants there.

Scope and Method of Survey

This article summarizes the findings of the sixth in a series of studies of the machinery-manufacturing industries, designed to provide basic information on the characteristics of the labor force, occupational patterns, and wage structure under a war economy. The establishments included in these studies are classified on the basis of their 1939 product, as reported by the Census of Manufactures.

According to the Census of Manufactures there were, in 1939, 223 plants in the industry group "Oil-field machinery and tools"; however, 48 establishments employing 5 workers or less were excluded from the scope of the present survey. The 42 plants from which data were obtained by means of this survey constitute approximately 24 percent of the remaining 175 establishments employing 6 or more workers. The sample plants were selected, as far as possible, to be representative of the industry with respect to geographic region,

¹ Prepared in the Bureau's Division of Wage Analysis by Odis C. Clark with the assistance of George E. Votava. The study was directed and the preparation of the report supervised by Harold R. Hosea. Previous articles of this series appeared in the Monthly Labor Review, issues of May, June, July, and August 1942.

size (in terms of number of employees), and certain other characteristics. Although proportionately more large plants than small were studied, the data for some of the large establishments were used with reduced weights in order to avoid overrepresentation of such establishments.

The data for the present survey were collected by trained field representatives of the Bureau who visited the plants and analyzed pay rolls and other pertinent records. The detailed wage statistics for individual employees were limited to day-shift workers in certain occupational groups, selected for their numerical importance or because they are key jobs. In general, occupational earnings rates were compiled for 80 to 90 percent of the wage earners on first (day) shifts. Most of the earnings data shown in this report are based on a representative pay-roll period during February or March 1942.

Characteristics of the Industry

GEOGRAPHIC DISTRIBUTION

Nearly half of the plants classified by the Census in this industry are located in the three States of Louisiana, Oklahoma and Texas, and almost three-fifths of the industry's workers were employed in this area during 1939. Nearly one-fourth of the plants are in California, but these plants employed less than one-fifth of the workers in the industry. The remaining quarter of the plants are more widely dispersed; most of them, however, are in the area lying between the Appalachian Mountains and the Mississippi River, and extending from the Lake States to Tennessee. The greatest concentration within this area is in Ohio, Pennsylvania, and West Virginia, in which are found about one-sixth of the establishments and workers in the industry. The plants and employees included in this survey show a geographical pattern roughly similar to that of the industry as a whole.

The manufacture of machinery of any type is typically carried on near areas of the product's ultimate utilization. This is especially true of oil-field machinery. The three States of Kansas, Oklahoma, and Texas have recently produced about 53 percent of the country's petroleum, and plants in these States employed 62 percent of the workers in the oil-field machinery industry in 1939. California produced about 17 percent of the petroleum in the United States, and in this State were employed about 18 percent of the workers engaged in the production of oil-field machinery. The States of Ohio, Pennsylvania, and West Virginia, which once produced a large part of the total national output, still employed 17 percent of the Nation's oil-field machinery workers in 1939, although less than 2 percent of the petroleum output in the United States was produced there. On the other hand, the new oil fields of Illinois produced about 10 percent of the country's petroleum, but less than 1 percent of the workers in the oil-field-machinery industry were employed in Illinois.

PRODUCTION OF WAR MATERIALS

During 1940 none of the 42 plants included in this survey was producing materials directly connected with the defense program. In 1941 only 11 plants were manufacturing defense materials, and in 10 of these plants the defense materials constituted less than 25 percent

of total production. Conversion became apparent in 1942, when 17 of the 42 plants were reported as manufacturing direct war materials. Of these 17 plants, 11 reported that war materials represented less than half of their sales volume for the period, and 4 stated that over 75 percent of their sales were in this category. None of the 42 plants was devoting its entire facilities to the production of materials for the war program. The fact should not be overlooked, of course, that oil-field machinery itself, although not here considered as a direct war material, plays a vital part in supplying the fuel and lubricants for mechanized armies.

Conversion in the industry varies considerably by size of plant. Of the 23 plants employing fewer than 50 workers, only 3 reported any conversion. This is in contrast to the 19 plants which employed 50 or more workers, of which 14 reported the manufacture of war materials.

THE LABOR FORCE

Distributions by skill class are available for the 3,155 workers for whom detailed earnings data were compiled. Approximately 37 percent of these workers may be regarded as skilled. Semiskilled and unskilled employees comprised approximately 34 and 29 percent, respectively, of the total.

Except for central-office personnel, practically no women were employed in the industry. Only 3 women were working in the 42 plants studied; 2 as janitresses and 1 as a packer.

Negroes comprised about 5 percent of the workers in the industry. Almost all were employed as laborers, helpers, or janitors. The employment of Negroes was negligible except in the Southern States, where 1 out of every 12 workers was a Negro.

Of the 42 plants studied, only 7 were operating under collective-bargaining agreements with nationally affiliated unions. These plants, however, employed approximately 37 percent of all the workers studied. Two of the remaining plants had agreements with independent unions, and 33 reported no agreements. Union agreements were seldom found in small plants; of the 23 plants employing fewer than 50 workers only 1 reported a union agreement. On the other hand, 6 of the 19 plants which employed 50 workers or more had agreements with affiliated unions. The 3 organized California plants had agreements with unions affiliated with the Congress of Industrial Organizations, and the 4 organized southern plants with unions affiliated with the American Federation of Labor. No agreements were reported for plants in the Atlantic or Midwest regions.

METHODS OF WAGE PAYMENT

There is no general use of incentive methods of wage payment in this industry. This fact undoubtedly reflects the lack of standardization in the production of oil-field machinery. Few processes in its manufacture are routine or repetitive, and piece rates cannot be established easily. In only 2 of the 42 plants in the survey were incentive systems of pay in effect; in 1 plant with fewer than 100 workers only 12 percent were thus employed, and in the other about four-fifths of the 235 workers were paid on a piece-rate basis. Over 94 percent of the workers in the industry were employed at straight-time rates.

Provisions for the payment of overtime in this industry are not so liberal as in some other branches of the machinery industries. In 20 of the 42 plants studied, overtime rates were paid only as required by Federal statute—time and a half after a 40-hour week. In 19 plants this rate was also paid after 8 hours in any 1 day, and in 3 plants the time-and-a-half rate was paid for all Saturday work.

In 29 plants no special provisions were reported for payment of Sunday or holiday work. Work on Sunday was paid for at the rate of time and a half in 10 plants; work on holidays was paid for at the same rate in 7 plants. Double time for overtime is not common in the industry. Double-time rates were paid for Sunday work in 3 plants, for holiday work in 1 plant, and for work in excess of 11 hours in 1 day in another plant.

Of the 42 plants studied, 20 were on a 1-shift basis, 10 operated 2 shifts, and 9 reported 3 shifts. For the remaining 3 plants information on this point is not available.

Of the 19 plants reported as operating more than 1 shift, 8 paid no differential for either the evening or night shift, 1 paid a bonus of 5 cents to working foremen only, and another paid a 5-cent differential for the night shift but none for the evening shift (table 1). Of the 11 plants paying some differential, 9 paid a flat-rate bonus (usually 5 cents per hour) to evening- and night-shift workers rather than a percentage rate or other bonus scaled to their regular earnings. In 5 of the 6 plants operating 3 shifts and paying some differential to workers on either the evening or night shifts, the differential was greater for night-shift than for evening-shift workers.

TABLE 1.—*Scale of Wages for Second and Third Shifts in Oil-Field-Machinery Plants, February–March 1942*

Type of plant	Number of plants	Differential paid for—	
		Second shift	Third shift
Plants with 1 shift only	20		
Plants with 2 shifts	5	No differential	
	3	5 cents per hour	
	1	5 cents, for working foreman only	
	1	8 hours' pay for 7½ hours' work	
Plants with 3 shifts	3	No differential	No differential.
	1	do.	5 cents per hour.
	1	3 cents per hour	5 cents per hour.
	1	4 cents per hour	7 cents per hour.
	1	5 cents per hour for workers at hourly rates up to 89 cents.	5 cents per hour for workers at hourly rates up to 89 cents.
		10 cents for workers at hourly rates of 90 cents and over.	10 cents for workers at hourly rates of 90 cents and over.
	1	5 cents per hour	10 cents per hour.
	1	8 hours' pay for 7½ hours' work	8 hours' pay for 7 hours' work.
	3	Data not available	

Employment, Hours, and Earnings

TREND FROM 1939 TO 1942

Comparable data on employment and earnings for selected periods since the outbreak of the war are available for 37 of the 42 plants studied. Employment in these plants increased from 2,276 in August 1939 to 3,651 in February–March 1942, or by 60 percent (table 2). Even this substantial increase is less marked than that of certain other machinery industries which have been more completely converted to war production.

TABLE 2.—*Employment, Average Hourly Earnings, and Average Weekly Hours of Workers in 37 Oil-Field-Machinery Plants for Specified Periods, 1939-42*

Year and month	Total workers ¹	Average workers per plant	Average hourly earnings ²	Estimated average hourly earnings, exclusive of extra overtime earnings	Average weekly hours
August 1939.....	2,276	67	\$0.715	\$0.706	37.0
April 1940.....	2,529	73	.718	.708	37.3
August 1940.....	2,417	71	.692	.679	38.3
February 1941.....	2,579	74	.722	.702	40.0
August 1941.....	3,330	96	.746	.707	43.4
February-March 1942.....	3,651	105	.804	.757	44.1

¹ Data for 1 plant used with reduced weight to avoid overrepresentation of large plants. The actual total employment for all 37 plants was 4,351.

² Data for 5 plants excluded because comparable figures for these plants were not available for earlier periods. Inclusion of data for these plants for February-March 1942 would show gross average hourly earnings of 83.0 cents and an average of about 77.6 cents, exclusive of extra overtime payments.

Average hourly earnings, including extra overtime payments, amounted to 71.5 cents in August 1939 and had increased to 80.4 cents by February-March 1942. During the same period, the average workweek in these plants increased from 37.0 hours to 44.1 hours, a change which progressively inflated hourly rates by increased premiums for overtime. The elimination of such penalty payments is estimated to reduce the average hourly earnings for the current period by nearly 5 cents, or to about 75.7 cents. Exclusive of the effect of penalty overtime payments, hourly rates increased slightly over 7 percent during the 30-month period.

PLANT AVERAGES, FEBRUARY-MARCH 1942

Nearly one-third (13) of the plants surveyed showed average hourly earnings, including penalty payments for overtime, of 90 cents or above, and 5 plants had average earnings of \$1.00 or more. On the other hand, 3 plants showed average hourly earnings below 60 cents. Of the 23 plants employing fewer than 50 workers, approximately two-fifths paid an average wage of 80 cents per hour or more; of the plants employing 50 workers or more, nearly three-fifths paid an average wage of at least 80 cents.

The 1,014 workers employed in California plants were paid an average of 97.5 cents per hour, nearly 15 cents above the average for the industry. The 2,336 workers employed in plants of the Southwest region received 79.8 cents on the average, and the 779 employees of plants in the Atlantic and Midwestern States were paid average earnings of 70.4 cents. These apparent regional differences, however, were in a considerable part a reflection of variations in size of plant, since the average number of workers per plant in California plants was at least 35 percent greater than the number in the Atlantic and Midwestern area, and nearly 15 percent greater than in the Southwest region.

AVERAGE EARNINGS BY OCCUPATION

For 15 occupational groups, the average hourly earnings were over \$1.00 during the period of the survey. These occupations include slightly more than 650 workers, or somewhat over a half of the skilled workers for whom detailed earnings data were secured. Three occupational groups, class A working foremen, tool and die makers, and wood

patternmakers, showed average hourly earnings of \$1.15 or more. The largest groups earning over \$1.00 per hour consisted of the 178 class A engine-lathe operators, 92 class A hand welders, and 65 class A turret-lathe operators (table 3). With but one exception, all class A machine operators were earning over \$1.00 per hour. This one exception was in the case of class A drill-press operators, an occupation which ordinarily requires less precision or less difficult set-ups than the work involved in other machine operations.

TABLE 3.—Average Hourly Earnings of Day-Shift Male Workers in Selected Occupations in Oil-Field-Machinery Plants, February-March 1942

Occupation and class	Number of workers	Average hourly earnings ¹	Occupation and class	Number of workers	Average hourly earnings ¹
Acetylene-burner operator.....	21	\$0.765	Lathe operators, engine, class B.....	66	\$0.788
Apprentices, first year.....	35	.506	Lathe operators, engine, class C.....	11	.551
Apprentices, second year.....	38	.545	Lathe operators, turret, class A.....	65	1.041
Apprentices, third year.....	14	.657	Lathe operators, turret, class B.....	47	.747
Apprentices, fourth year.....	2	(²)	Lay-out men, class A.....	16	.989
Assemblers, bench, class A.....	26	.962	Lay-out men, class B.....	3	(²)
Assemblers, bench, class B.....	35	.726	Machinists, class A.....	132	.992
Assemblers, bench, class C.....	65	.614	Machinists, class B.....	21	.880
Assemblers, floor, class A.....	54	.937	Metal-saw operators.....	18	.621
Assemblers, floor, class B.....	58	.809	Milling-machine operators, class A.....	46	1.042
Assemblers, floor, class C.....	36	.652	Milling-machine operators, class B.....	46	.717
Blacksmiths.....	30	1.030	Millwrights.....	16	.930
Boring-mill operators, class A.....	30	1.088	Molders, bench.....	11	.994
Boring-mill operators, class B.....	21	.623	Molders, floor.....	26	1.001
Broaching-machine operators.....	4	(²)	Molders, machine, class A.....	2	(²)
Bulldozer operators.....	4	(²)	Molders, machine, class B.....	7	(²)
Carpenters, class A.....	10	.727	Molders' helpers.....	26	.439
Carpenters, class B.....	14	.767	Packers.....	11	.719
Carpenters, class C.....	1	(²)	Painters, brush.....	12	.682
Carpenters, flask.....	3	(²)	Painters, spray.....	12	.619
Casting cleaners.....	36	.535	Patternmakers, wood.....	10	1.155
Coremakers.....	14	.960	Pipefitters.....	5	(²)
Coremakers' helpers.....	7	(²)	Planer operators.....	20	1.036
Crane followers.....	4	(²)	Platers.....	1	(²)
Crane operators.....	41	.696	Power-shear operators.....	9	.717
Craters.....	1	(²)	Punch-press operators, class A.....	2	(²)
Cupola tenders and helpers.....	13	.552	Punch-press operators, class B.....	18	.769
Drill-press operators, class A.....	25	.880	Repairmen, machine.....	13	1.031
Drill-press operators, class B.....	49	.713	Riveters, pneumatic.....	3	(²)
Drill-press operators, class C.....	26	.555	Sand blasters.....	6	(²)
Drop-hammer operators, class A.....	4	(²)	Sand mixers, hand.....	4	(²)
Drop-hammer operators, class B.....	4	(²)	Sand mixers, machine.....	3	(²)
Electricians.....	21	.957	Screw-machine operators, class A.....	2	(²)
Elevator operators.....	2	(²)	Screw-machine operators, class B.....	10	.922
Firemen, stationary boiler.....	11	.531	Screw-machine operators, class C.....	9	(²)
Flask and pattern carriers.....	2	(²)	Shake-out men.....	19	.507
Foremen, working, class A.....	50	1.252	Shaper operators.....	26	.974
Foremen, working, class B.....	13	1.073	Sheet-metal workers, class A.....	4	(²)
Foremen, working, class C.....	14	.735	Sheet-metal workers, class B.....	4	(²)
Gear cutters, class A.....	3	(²)	Stock clerks.....	88	.662
Gear cutters, class B.....	4	(²)	Straighteners.....	6	.806
Gear finishers.....	3	(²)	Testers, class A.....	1	(²)
Grinding-machine operators, class A.....	19	1.001	Testers, class B.....	2	(²)
Grinding-machine operators, class B.....	25	.708	Testers, class C.....	5	(²)
Hammersmiths.....	17	.974	Thread-milling-machine operators.....	16	.671
Heat treaters, class A.....	24	.932	Time clerks.....	5	(²)
Heat treaters, class B.....	14	.767	Tool and die makers.....	40	1.163
Helpers, general.....	119	.589	Tool-grinder operators.....	26	.930
Helpers, journeymen's.....	139	.685	Truck drivers.....	37	.647
Helpers, machine operators.....	154	.605	Truckers, inside (power).....	3	(²)
Inspectors, class A.....	31	1.087	Truckers, hand.....	20	.606
Inspectors, class B.....	45	.708	Tumbler operators.....	2	(²)
Inspectors, class C.....	13	.572	Upsetters.....	5	(²)
Janitors.....	41	.550	Watchmen.....	87	.460
Job setters.....	4	(²)	Welders, hand, class A.....	92	1.066
Laborers.....	208	.450	Welders, hand, class B.....	28	.814
Laborers, foundry.....	40	.386	Welders, machine.....	8	.925
Lathe operators, engine, class A.....	178	1.092	Woodworkers.....	3	(²)
			Total.....	3,155	.769

¹ Averages are based on actual earnings, exclusive of penalty overtime and shift payments.

² Number of plants and/or workers too small to justify computation of an average; data on numbers of workers are included in such cases to provide additional information on occupational distribution.

About 650 male workers were classified in 13 occupations (apprentices excepted) which showed average hourly earnings below 60 cents. In 4 of these occupational groups—foundry laborers, general laborers, molders' helpers, and watchmen—the average hourly earnings were below 50 cents. Nearly one-fourth of those with average hourly earnings of less than 60 cents were classified as helpers.

Comparisons of occupational averages on a regional basis are possible for 23 occupational groups, as indicated in table 4. In general, the rates for the California plants were highest and those for plants in the Atlantic and Midwestern States were lowest. This corresponds to the relationships found in connection with general plant averages. Machine-operator helpers, laborers, stock clerks, and tool and die makers, were the only important exceptions. All 4 of these groups involve occupations ordinarily paid on a straight-time basis rather than under an incentive system of wage payment. The rates for tool and die makers were undoubtedly influenced by the recognized shortage of such workers.

As noted earlier, in the discussion of plant averages, these differences are accentuated by regional variations in size of plant. The data available are not adequate to permit a precise statement of the effect of these variations, but it is certain that the differences shown in table 4 would be somewhat reduced were it possible to make allowance for the fact that the typical California plant is larger than the average for all those studied, whereas the Atlantic and Midwestern plants are about a fourth smaller than the general average.

TABLE 4.—Average Hourly Earnings¹ of Day-Shift Workers in Oil-Field-Machinery Plants, by Occupation and Region, February–March 1942

Occupation and class	Southwestern States		California		Atlantic and Midwestern States	
	Number of workers	Average hourly earnings	Number of workers	Average hourly earnings	Number of workers	Average hourly earnings
Assemblers, floor, class A.....	45	\$0.873	9	\$0.989	3	(²)
Assemblers, floor, class B.....	34	.740	25	.832	1	(²)
Assemblers, floor, class C.....	17	.627	19	.657		
Blacksmiths.....	14	1.036	9	1.056	7	\$0.910
Crane operators.....	15	.727	8	.847	18	.602
Drill-press operators, class B.....	21	.665	22	.776	6	.592
Foreman, working, class A.....	18	1.204	23	1.288	9	1.189
Helpers, general.....	30	.583	19	.687	69	.569
Helpers, journeymen's.....	50	.617	38	.801	55	.616
Helpers, machine operators'.....	78	.520	55	.689	21	.700
Inspectors, class A.....	17	.985	13	1.192	1	(²)
Inspectors, class B.....	30	.652	10	.793	5	(²)
Laborers.....	175	.421	2	(²)	31	.607
Lathe operators, engine, class A.....	75	1.070	73	1.177	31	.913
Lathe operators, engine, class B.....	32	.802	7	.889	27	.744
Lathe operators, turret, class A.....	30	.987	32	1.097	3	(²)
Lathe operators, turret, class B.....	21	.675	22	.861	4	(²)
Milling-machine operators, class A.....	21	1.071	15	1.154	9	.901
Milling-machine operators, class B.....	30	.689	11	.848	5	.600
Stock clerks.....	60	.623	17	.768	11	.680
Tool and die makers.....	24	1.158	15	1.079	1	(²)
Watchmen.....	38	.578	11	.602	19	.602
Welders, hand, class A.....	53	1.039	30	1.166	9	.887

¹ Averages are based on actual earnings, exclusive of penalty overtime payments.

² Number of plants and/or workers too small to justify computation of an average. Data on numbers of workers are included in such cases to provide additional information on occupational distribution.

WAGE-RATE CHANGES IN UNITED STATES INDUSTRIES

THE following table gives information concerning wage-rate adjustments occurring during the month ending June 15, 1942, as shown by reports received from manufacturing and nonmanufacturing establishments which supply employment data to the Bureau of Labor Statistics.

As the Bureau's survey does not cover all establishments in an industry and furthermore, as some firms may have failed to report wage-rate changes, these figures should not be construed as representing the total number of wage changes occurring in manufacturing and non-manufacturing industries.

*Wage-Rate Changes Reported by Manufacturing and Nonmanufacturing Establishments
During Month Ending June 15, 1942¹*

Group and industry	Establishments		Employees		Average percent of change in wage rates of employees having increases
	Total number covered	Number reporting increases	Total number covered	Number receiving increases	
All manufacturing.....	34,428	1,157	8,586,676	315,776	8.3
Durable goods.....	13,287	514	5,145,967	149,563	7.8
Nondurable goods.....	21,141	643	3,440,709	166,213	8.6
Iron and steel and their products, not including machinery.....	2,665	97	1,231,835	32,362	8.9
Blast furnaces, steel works, and rolling mills.....	345	6	589,328	4,922	7.0
Bolts, nuts, washers, and rivets.....	62	3	18,206	208	9.7
Cutlery (not including silver and plated cutlery) and edge tools.....	110	3	16,540	517	7.1
Forgings, iron and steel.....	98	7	24,600	1,722	8.8
Hardware.....	155	7	39,997	386	7.7
Plumbers' supplies.....	102	3	20,110	304	6.5
Stamped and enameled ware.....	288	9	50,528	2,996	10.3
Steam and hot-water heating apparatus and steam fittings.....	115	6	46,144	1,983	7.2
Stoves.....	250	4	33,890	1,468	9.4
Structural and ornamental metalwork.....	287	10	37,039	1,041	9.8
Tin cans and other tinware.....	138	3	29,724	622	7.9
Wirework.....	173	10	20,734	931	8.0
Screw-machine products.....	89	12	29,718	1,923	10.9
Saws and files.....	25	5	9,983	3,294	9.9
Machinery, not including transportation equipment.....	4,033	169	1,455,179	61,393	7.5
Agricultural implements (including tractors).....	119	9	69,550	5,668	5.7
Electrical machinery, apparatus, and supplies.....	620	19	(²)	8,897	7.5
Engines, turbines, water wheels and windmills.....	87	7	(²)	5,940	9.6
Foundry and machine-shop products.....	2,321	82	449,267	17,403	7.2
Machine tools.....	155	8	(²)	5,717	6.9
Radios and phonographs.....	84	9	50,712	3,208	10.3
Textile machinery and parts.....	118	7	28,284	4,033	10.2
Machine-tool accessories.....	159	10	(²)	910	11.0
Pumps.....	103	7	37,911	7,580	5.5
Refrigerators and refrigerating apparatus.....	64	4	24,969	1,093	7.2
Metalworking machinery.....	89	6	27,380	906	5.8
Transportation equipment.....	921	21	1,555,915	11,731	7.1
Aircraft.....	152	5	(²)	4,430	4.7
Automobiles.....	383	8	363,599	2,420	8.9
Shipbuilding.....	263	5	(²)	4,205	7.7
Nonferrous metals and their products.....	1,188	42	308,381	12,846	7.3
Aluminum manufactures.....	61	4	(²)	1,168	7.5
Brass, bronze, and copper products.....	384	15	(²)	5,133	7.0
Lighting equipment.....	87	5	11,007	612	11.5
Smelting and refining—copper, lead, and zinc.....	51	5	31,716	4,441	7.4
Sheet-metal work.....	155	6	12,510	358	10.7
Smelting and refining of scrap metal.....	49	5	6,159	1,114	11.4

See footnotes at end of table.

Wage-Rate Changes Reported by Manufacturing and Nonmanufacturing Establishments
During Month Ending June 15, 1942¹—Continued

Group and industry	Establishments		Employees		Average percent of change in wage rates of employees having increases
	Total number covered	Number reporting increases	Total number covered	Number receiving increases	
Lumber and allied products.....	2, 871	106	360, 094	18, 613	8.3
Furniture.....	760	12	106, 767	2, 472	6.2
Lumber:					
Millwork.....	559	17	38, 888	1, 474	9.7
Sawmills.....	720	49	140, 040	11, 433	8.1
Caskets and morticians' goods.....	104	4	6, 074	32	7.1
Wood preserving.....	52	4	6, 564	261	14.9
Wood, turned and shaped.....	103	3	8, 013	559	7.5
Wooden boxes, other than cigar.....	144	8	14, 976	1, 049	8.6
Mattresses and bed springs.....	202	3	10, 865	313	9.6
Stone, clay, and glass products.....	1, 609	79	234, 563	12, 618	6.9
Brick, tile, and terra cotta.....	501	14	43, 080	918	12.1
Cement.....	131	27	24, 494	5, 725	6.9
Glass.....	151	4	71, 452	1, 260	8.5
Marble, granite, slate, and other products.....	232	14	5, 128	348	6.1
Pottery.....	130	5	34, 273	150	8.7
Asbestos products.....	52	6	14, 819	3, 529	5.2
Lime.....	95	4	6, 723	412	5.9
Textiles and their products.....	6, 886	264	1, 420, 264	97, 388	9.2
Fabrics.....	3, 441	216	1, 037, 621	93, 847	9.1
Cotton goods.....	823	9	469, 398	4, 064	8.6
Dyeing and finishing textiles.....	213	9	54, 549	1, 385	9.4
Hosiery.....	506	46	100, 109	19, 764	7.8
Knitted underwear.....	139	3	42, 451	2, 389	4.6
Knit cloth.....	77	3	8, 096	98	8.4
Silk and rayon goods.....	467	11	81, 426	1, 149	8.0
Woolen and worsted goods.....	417	121	164, 471	63, 280	9.6
Wool shoddy.....	35	5	2, 820	509	11.1
Wearing apparel.....	3, 445	48	382, 643	3, 541	12.1
Clothing, men's.....	1, 090	19	155, 046	1, 412	13.1
Clothing, women's.....	1, 267	12	84, 702	1, 014	11.2
Leather and its manufactures.....	1, 104	18	250, 290	6, 481	7.0
Boots and shoes.....	497	9	172, 532	3, 537	6.6
Leather.....	183	6	38, 807	2, 913	7.4
Food and kindred products.....	5, 253	135	519, 524	11, 133	9.7
Baking.....	995	39	82, 376	3, 333	9.2
Beverages.....	616	13	46, 471	1, 066	4.1
Canning and preserving.....	1, 064	16	89, 054	2, 001	11.7
Confectionery.....	270	7	33, 624	468	10.0
Flour.....	332	4	15, 201	66	6.7
Ice cream.....	264	5	11, 646	185	10.2
Slaughtering and meat packing.....	325	7	147, 367	299	10.3
Sugar, beet.....	76	4	4, 533	426	10.0
Distilled and vinous liquors.....	85	4	12, 617	216	9.5
Condensed and evaporated milk.....	111	3	8, 819	362	10.6
Paper and Printing.....	3, 904	111	386, 076	27, 269	7.5
Boxes, paper.....	681	24	48, 003	3, 058	8.3
Paper and pulp.....	416	54	133, 016	21, 072	7.4
Printing and publishing:					
Book and job.....	1, 481	8	75, 983	494	8.0
Newspapers and periodicals.....	703	11	60, 114	455	6.2
Paper bags.....	31	3	7, 039	689	6.3
Envelopes.....	66	4	6, 986	882	8.6
Chemical, petroleum, and coal products.....	2, 405	81	459, 713	11, 542	7.1
Petroleum refining.....	179	4	80, 794	565	10.3
Chemicals.....	265	20	90, 238	4, 733	5.6
Druggists' preparations.....	96	3	17, 696	198	7.9
Fertilizers.....	335	6	13, 569	225	16.8
Paints and varnishes.....	488	12	23, 758	149	7.7
Soap.....	92	3	15, 339	806	5.9
Roofing materials.....	26	4	4, 657	970	6.0
Patent medicines.....	104	4	5, 126	163	6.2
Rubber products.....	272	8	124, 219	6, 595	9.2
Rubber goods, other than footwear and tires.....	222	7	49, 747	4, 549	10.1

See footnotes at end of table.

*Wage-Rate Changes Reported by Manufacturing and Nonmanufacturing Establishments
During Month Ending June 15, 1942¹—Continued*

Group and industry	Establishments		Employees		Average percent of change in wage rates of employees having increases
	Total number covered	Number reporting increases	Total number covered	Number receiving increases	
Miscellaneous.....	1,103	25	211,092	4,331	6.8
Fabricated plastic and wood pulp products.....	78	5	19,735	829	7.5
Buttons.....	56	3	6,839	111	8.3
Nonmanufacturing (except building construction).....	³ 90,220	459	³ 3,125,200	33,596	9.0
Metalliferous mining.....	³ 520	11	³ 89,200	1,357	8.6
Quarrying and nonmetallic mining.....	³ 1,230	28	³ 48,600	1,051	9.4
Public utilities:					
Telephone and telegraph.....	³ 9,640	4	³ 342,000	69	5.0
Electric light and power.....	³ 2,750	90	³ 224,800	3,615	6.3
Manufactured gas.....	³ 140	4	³ 27,900	3,667	7.4
Street railways and busses.....	³ 330	63	³ 140,100	7,718	11.6
Trade:					
Wholesale trade.....	³ 14,860	30	³ 342,300	890	11.6
Retail trade.....	³ 49,500	118	³ 1,042,500	1,051	10.7
Hotels (year-round).....	³ 1,880	8	³ 146,100	395	9.9
Laundries.....	³ 1,290	11	³ 89,000	448	10.4
Dyeing and cleaning.....	³ 800	7	³ 20,800	178	9.3
Insurance.....	³ 3,560	81	³ 164,600	12,954	8.2

¹ Figures are not given for some industries to avoid disclosure of information concerning individual establishments. They are, however, included where practicable in "all manufacturing," and in the various industry groups. No decreases reported.

² Included in group totals but not available for publication separately.

³ Approximate—based on previous month's sample.



EARNINGS OF BRITISH WORKERS IN JANUARY 1942

WEIGHTED average earnings of wage workers in Great Britain and Northern Ireland amounted to 77s. 9d. weekly in January 1942. In order to obtain information on the wartime trend of earnings, the British Ministry of Labor has made four wage surveys in recent years, of which this is the latest, covering wage earners in 16 industries, including manufacturing generally, the chief nonmanufacturing industries, and Government industrial establishments. For October 1938, weekly earnings averaged 53s. 3d. The averages had increased 29.9 percent, to 69s. 2d., in July 1940; 42.4 percent, to 75s. 10d., in July 1941; and 46.0 percent in January 1942, to the level shown above. The results of the study are summarized from the British Ministry of Labor Gazette for June 1942.

In each succeeding inquiry the methods used corresponded with those of previous surveys, in order to make the results as nearly comparable as possible, and the final figures were tabulated on the basis of the actual returns and weighted according to the number of workers employed in the different industries. The weighted averages are given here. Forms were sent to nearly 56,700 establishments in the 1942 inquiry. Approximately 56,200 furnished returns suitable for tabulation, covering over 6,000,000 workers. Earnings of all classes of manual wage earners were included in the sample—unskilled workers and general laborers as well as operatives in skilled occupations.

Earnings in 1938 and 1942

Average weighted weekly earnings in the last pay week of October 1938 and of January 1942 are shown for each of the 16 industries and for all industries combined and by sex and age of workers in table 1.

TABLE 1.—Average Weekly Earnings by Industry, Sex, and Age of Workers, Great Britain and Northern Ireland, October 1938 and January 1942

Industry group	Males		Females		All workers
	21 years and over	Under 21 years	18 years and over	Under 18 years	
October 1938					
All industries	s. 69 0	s. 26 1	s. 32 6	s. 18 6	s. 53 3
Iron, stone, etc., mining, and quarrying	60 0	30 2	(1)	(1)	56 8
Treatment of nonmetalliferous mine and quarry products	66 5	31 1	29 8	17 11	61 0
Brick, pottery, and glass	63 2	27 8	27 10	14 10	47 8
Chemical, paint, oil, etc.	69 3	29 5	32 8	18 2	55 0
Metal, engineering, and shipbuilding	75 0	26 1	33 4	19 11	59 8
Textiles	57 3	24 0	31 9	19 8	37 10
Leather, fur, etc.	64 1	25 4	34 11	17 6	46 9
Clothing	64 3	24 9	32 9	17 6	35 0
Food, drink, and tobacco	65 3	28 1	32 11	19 0	47 0
Woodworking	66 3	23 4	33 8	17 5	51 10
Paper, printing, stationery, etc.	84 3	24 8	34 1	17 1	57 7
Building, contracting, etc.	66 0	25 8	(1)	(1)	61 2
Miscellaneous manufacturing industries	69 1	26 8	31 9	18 5	46 6
Transport, storage, etc. (excluding railways)	70 0	27 1	34 11	(1)	65 6
Public-utility services	63 1	27 7	27 8	21 5	59 8
Government industrial establishments	75 3	32 7	44 9	(1)	70 6
January 1942					
All industries	s. 102 0	s. 42 6	s. 47 6	s. 26 10	s. 77 9
Iron, stone, etc., mining, and quarrying	81 3	43 7	(1)	(1)	75 2
Treatment of nonmetalliferous mine and quarry products	92 7	45 0	46 9	31 1	81 4
Brick, pottery, and glass	88 10	39 1	39 11	23 7	64 9
Chemical, paint, oil, etc.	100 2	39 0	48 2	24 11	74 7
Metal, engineering, and shipbuilding	119 2	45 2	53 7	31 0	93 0
Textiles	84 6	37 6	43 4	28 3	54 1
Leather, fur, etc.	90 9	40 2	42 6	25 3	64 4
Clothing	85 0	34 6	41 2	23 7	45 4
Food, drink, and tobacco	88 3	37 1	41 6	25 5	60 11
Woodworking	86 2	34 5	44 8	25 10	66 3
Paper, printing, stationery, etc.	101 3	31 9	41 10	22 9	69 5
Building, contracting, etc.	84 2	44 11	46 1	(1)	78 1
Miscellaneous manufacturing industries	104 4	43 8	45 8	28 0	68 6
Transport, storage, etc. (excluding railways)	92 10	41 2	60 7	(1)	84 4
Public-utility services	79 9	35 2	38 5	25 3	73 4
Government industrial establishments	115 8	44 7	58 10	36 2	89 9

¹ Number in this group was very small.

By comparison with the average unweighted earnings, the weighted averages for January 1942 are lower in most cases. Weighting of earnings resulted in drops of 1s. 5d. (from 103s. 5d. to 102s.) in the weekly average for men; of 6d. (from 48s. to 47s. 6d.) for women; of 1d. (from 26s. 11d. to 26s. 10d.) for girls; and of 6d. (from 78s. 3d. to 77s. 9d.) for all workers. Weighted earnings of 42s. 6d. for boys were 7d. higher than the unweighted figure (41s. 11d.). The large difference in the averages for men is primarily because of the underrepresentation of employees in the building and contracting industries owing to bad weather in the last week of January 1942.

Between October 1938 and January 1942 weighted average earnings advanced 47.8 percent for men, 62.9 percent for boys, 46.2 percent for women, 45.0 percent for girls, and 46.0 percent for all workers. Among the 16 industries covered, metal, engineering, and shipbuilding showed the sharpest rise, 55.9 percent for all workers combined, followed by miscellaneous manufacturing with 47.3 percent, and textiles with 43.0 percent. Five industries showed gains of over 30 and under 40 percent—iron, stone, etc., mining, and quarrying; treatment of nonmetalliferous mine and quarry products; brick, pottery, and glass; chemical, paint, oil, etc.; and leather, fur, etc. In the remaining 8 industries the increases were over 20 and under 30 percent.

For men the increases in average weekly earnings over the period ranged from 20.2 percent in the paper, printing, etc., industries and 26.4 percent in the public-utility services to 58.9 percent in the metal, engineering, and shipbuilding group. For women the variation was even greater; that is, from a low of 21.7 in the leather, fur, etc., group to 73.5 percent in transport, storage, etc.

The Ministry of Labor Gazette states that the changes in earnings for all classes of labor between the survey periods of 1938 and 1942 are affected by alterations in the relative proportions of men, boys, women, and girls employed in each of the various groups of industries. The proportion of men dropped, while that of women increased. Transference of workers to high-paid munitions jobs from industries having lower average earnings raised the averages.

Comparison of Four Surveys

Each successive earnings study has shown a larger increase for boys than for any other group, followed by men. The rises for women and girls were lower and practically identical for both groups in each of the years 1940, 1941, and 1942 as compared with 1938. However, the rate of increase differed in these three periods. Average weekly earnings are presented in table 2 for October 1938, July 1940, July 1941, and January 1942, with percentage changes by sex and age groups.

Between July 1941 and January 1942 the averages for all industries combined and for men increased approximately 2.5 percent, for boys nearly 1.5 percent, for women 8 percent, and for girls 7 percent. The 1941-42 rate of increase was far below the rates recorded in the two preceding surveys. Each study showed wide variations in the rises of earnings in different industries. For example, in paper, printing, etc., the increase from October 1938 was 20 percent for men and less than 23 percent for women, while in metal, engineering, and shipbuilding the corresponding advances were 59 and 61 percent, respectively.

TABLE 2.—Average Weekly Earnings of Workers, by Sex and Age, and Percentage Changes in Great Britain and Northern Ireland, 1938, 1940, 1941, and 1942

Date	Average weekly earnings					Percent of increase over October 1938				
	Males		Females		All work-ers	Males		Females		All work-ers
	21 years and over	Under 21 years	21 years and over	Under 21 years		21 years and over	Under 21 years	21 years and over	Under 21 years	
October 1938.....	s. d.	s. d.	s. d.	s. d.	s. d.					
July 1940.....	69 0	26 1	32 6	18 6	53 3					
July 1941.....	89 0	35 1	38 11	22 4	69 2	29.0	34.5	19.7	20.7	29.9
January 1942.....	99 5	41 11	43 11	25 0	75 10	41.1	60.7	35.1	35.1	42.4
	102 0	42 6	47 6	26 10	77 9	47.8	62.9	46.2	45.6	46.0

¹ Some firms who supplied returns showing the total earnings of their work people in July 1940 did not give details analyzed by sex and age. If detailed figures had been available for these firms, the average earnings shown for men in July 1940 and the percentage increases as compared with October 1938 would probably have been slightly in excess of the figures shown in the table.

Factors in Increases

Among the factors in the rise in earnings the Ministry of Labor lists (1) increases in rates of wages, (2) fuller employment with longer working hours and more extended working of night shifts, (3) extension of systems of payment by results, and (4) changes in the proportion of men, boys, women, and girls employed in different industries and occupations. In the 16 industries covered, wage rates alone for a full ordinary week's work (exclusive of overtime) are estimated to have increased approximately as follows over October 1938: 10 or 11 percent to July 1940; 18 percent to July 1941; and 22 percent to January 1942.

Hours of work were abnormally long in July 1940, when output of munitions was being speeded up. Earnings were raised, owing to payment of wages for extra hours and also overtime and bonus payments. Although working time on the two dates in 1941 and 1942 was well above the normal 1938 period, it was not as long as in 1940. It is also stressed in the report under review that severe weather in January 1942 curtailed outdoor employment.

Wartime changes in the number employed in the different industries have tended to raise earnings levels of men, boys, women, and girls, respectively, through transference from low-wage to high-wage industries. However, "all-worker" averages are affected by the reduction in the proportions of men employed and the rise in woman employees.



WARTIME WAGE INCREASES IN NEW ZEALAND¹

UNDER its war powers the Court of Arbitration in New Zealand authorized wage-rate increases of 5 percent to workers covered by awards, industrial agreements, and apprenticeship orders, on two occasions, the first of which was in 1940 and the second in the spring

¹ Data are from reports Nos. 18 and 61 (1942) by Basil D. Dahl, American consul at Wellington, New Zealand; International Labor Review, Montreal, December 1940 and January 1941; The Standard, Wellington, issue of December 24, 1941; and Monthly Labor Review, issue of April 1942.

of 1942. Before the war, the court had no power to vary wages during the terms of awards, which usually ran from 1 to 3 years. Exceptions to this rule were previously made in 1918-23 and again in 1931-32. The recent advances in wages were intended to compensate for increases in living costs that occurred in spite of efforts to secure stabilization.

Situation in 1940 and 1941

Authority for the first wage-rate rise was granted to the court on the joint recommendation to the Government made by the New Zealand Federation of Labor, the New Zealand Employers' Federation, and the Manufacturers' Federation. On May 13, 1940, the Minister of Labor announced that the Government had decided to give the court the power to make a general order affecting rates of pay prescribed by awards, industrial agreements, and apprenticeship orders, taking into account the economic and financial conditions affecting trade and industry in the country, cost of living, and other relevant considerations. The powers to vary rates of pay were authorized for the duration of the war and 6 months thereafter. The first general order granting a 5-percent wage increase was made on August 9, 1940, and became effective 3 days later.

An application made by the New Zealand Engine Drivers' Union on October 1, 1941, for a further general order increasing wages was refused by the court on December 18, 1941. The union sought a 7.8-percent advance in rates of pay at that time to compensate for increased living costs. In the opinion of the court, with the labor member dissenting, it was held that existing economic and financial conditions affecting trade and industry, and the immediate outlook for the future of trade and industry in New Zealand were such that a general order raising rates of pay was not justified. The court stated that since the previous general wage order was made, the cost of living had increased by 5.16 percent (that is, over the July 1940 index) and the total rise from August and September 1939 was 8.54 percent; and that when the 5-percent wage rise was authorized in August 1940, past increases in cost of living were taken into account and also the probable upward change in the 6 months following the date of the order.

Change Authorized in 1942

On January 30, 1942, the New Zealand Engine Drivers' Union again submitted an application for a wage increase. This time the general increase requested was 9.6 percent. In support of its claim the union reviewed the earlier judgment of the court refusing wage relief. The president of the union stated that the Government's policy of stabilization still commanded the approval of the workers but that stabilization of prices had not been effective. Real wages had been further reduced by advances in retail prices. Changes in the retail-price index were 7.1 percent from June 1940 to December 1941, and allowing for estimated unrecorded increases in the rent index, 7.3 percent. Analyzing present and prospective retail index figures he added that the court's own calculations would justify an 8.2-percent rise, excluding the unrecorded increase in rents. The argument presented was

that the retail-price index understated the cost of living by at least 2.5 percent, and that after adding that figure to the recorded increase in the retail-price index, the increase to which wage earners were entitled was 9.6 percent.

In the opinion of the union's president the upward movement in the volume of factory production was substantially due to the higher rate of production of the workers. Wage earners had been injured by the change in the distribution of goods and services since the outbreak of war, it was added, and the court was being asked to improve labor's position by raising wages to insure that wage earners should obtain their fair share of the available goods and services. In conclusion it was stated that effective wage rates were approximately at the 1935 level, and maintenance of the rate of production was threatened.

Before the new application was considered, the Court of Arbitration had been vested with further powers through an amendment (on February 18, 1942) to the Rates of Wages Emergency Regulations of 1940. In making any general order the court was empowered to exclude from its scope any part of the remuneration of workers affected by the order in excess of an amount determined by the court (varied for female workers, juniors, and apprentices, respectively). Where such an exclusion is authorized by the court any wage order made shall apply on the portion of the worker's pay that is not excluded, irrespective of his total pay. "Pay or remuneration," as used in the amendment, means all earnings, including time and piece wages and overtime and any other special payments.

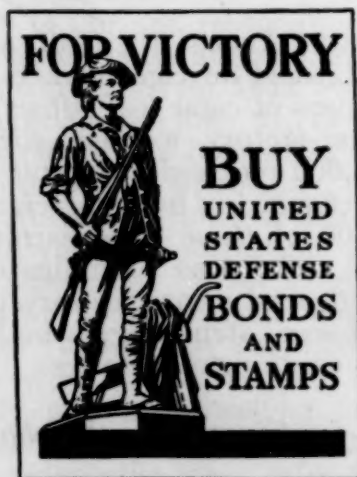
In its latest review of wages the court concluded that workers were entitled to an increase of 4.67 percent on the basis of the rise in the retail-price index alone. The calculation was made as follows: At the time of the preceding general wage order (August 9, 1940) the retail-price index number was 1027. According to the December 1941 judgment of the court, the 1940 order took into account an anticipated increase of 19 points in the retail-price index in the subsequent 6 months. Since the retail-price index had advanced to 1094 by the end of January 1942, the portion of the 67-point rise (from August 1940) that had not been taken into account at the time of the first general wage order was therefore 48 points, or 4.67 percent. The rise authorized was 5 percent, payable on weekly earnings of not to exceed £5 for adult males, £2 10s. for adult females, and £1 10s. for juniors (under 21 years of age) and apprentices. The ceiling on earnings in respect to which the increase in wages was authorized made the maximum addition to men's earnings 5s. weekly; to women's earnings 2s. 6d.; and to juniors and apprentices 1s. 6d.

A memorandum accompanying the order stated that the standard of living would decline inevitably as a result of the war. Nevertheless wage rates in many cases rose in the preceding few months, owing to the increased demand for certain classes of labor which are scarce. The court does not fix the rates of wages actually paid, but establishes only those in industries subject to awards.

The rising purchasing power of civilians, resulting from increased wages, lengthened hours, and overtime rates, at the same time that the value and volume of available goods was diminishing, had contributed to an inflationary tendency. To this tendency, the court claimed, its activities had contributed little in the period subject to review. The

only means of control, the court held, was by placing a ceiling on wage rates. Measures taken by the Government to stabilize prices of 38 essential commodities, as from September 1, 1941, had not brought the desired results. In the 5 months following the introduction of stabilization the retail-price index rose more rapidly than in the preceding 5-month period, and therefore the court did not find it difficult to understand worker applications for wage increases.

The court expressed the hope that the decision to grant some relief to wage earners would contribute to improvement in industrial relations, increased productive effort of workers, unconditional and complete abandonment of all activity likely to retard the war effort, and a strengthening of the national morale and unity of purpose.



Wage and Hour Regulation

MINIMUM RATES UNDER FAIR LABOR STANDARDS ACT

40-Cent Wage for Leather-Goods, etc., Industry

FORTY cents an hour became the minimum wage in the luggage, leather goods, and women's handbag industry on July 27, 1942, in compliance with an order issued by the Administrator of the Wage and Hour Division under the provisions of the Fair Labor Standards Act.¹ As defined, the industry includes not only the manufacture of small leather goods and like articles from any material except metal but also women's handbags, which were formerly included in the apparel industry. Some 12,500 persons in the industry had their wages increased by the terms of the wage order. The total number of employees is estimated at approximately 34,000, of whom 21,500 already were earning 40 cents an hour or over.

Earlier wage orders provided a 35-cent hourly minimum rate for the luggage and leather-goods industry² and for the manufacture of women's handbags.³

40-Cent Rate for Cigar Makers and 35-Cent Rate for Cigar Leaf-Tobacco Handlers¹

By wage order effective August 10, 1942, a minimum wage of 40 cents an hour was established for cigar makers and a rate of 35 cents for handlers and stemmers of cigar leaf tobacco. Some 45,000 cigar makers and other cigar-factory workers come under the 40-cent minimum, of whom 17,000 received wage increases by reason of the wage order. Workers engaged in handling cigar leaf tobacco number 18,000, and about 8,000 of these were earning less than 35 cents hourly when the wage order was promulgated. The 35-cent rate applies to all workers engaged in preparatory processing of cigar leaf tobacco, including tobacco stemming, whether employed in the dealer's establishments or in cigar factories.

40-Cent Rate for Cigarette and Tobacco Industry

In the manufacture of cigarettes, snuff, chewing tobacco, and smoking tobacco 40 cents an hour became the minimum hourly wage on August 10, 1942, by order of the Administrator of the wage and hour law.⁴ Investigation showed that 5,000 employees in tobacco manu-

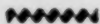
¹ U. S. Department of Labor. Wage and Hour Division, Press release No. R. 1828.

² See Monthly Labor Review, issue of January 1941 (p. 173).

³ See Monthly Labor Review, issue of September 1940 (p. 554).

⁴ U. S. Department of Labor. Wage and Hour Division, Press release No. R. 1832.

facturing plants and about 40,000 workers engaged in leaf processing would receive an increase in wages owing to the introduction of the 40-cent rate. Approximately one-half of those receiving wage increases are employed in North Carolina and most of the others in Virginia and Kentucky.



MINIMUM RATES UNDER PUBLIC CONTRACTS ACT

*40- and 50-Cent Rate for Wood Furniture and Public Seating Industries*¹

BY THE terms of a determination of the Secretary of Labor prevailing minimum wages for the wood furniture branch of the furniture manufacturing industry are fixed at 50 cents hourly for the States of California, Washington, and Oregon and 40 cents in all other States and the District of Columbia. In the public-seating branch the 40-cent rate applies in all areas. These minimum rates of pay are effective on and after August 15, 1942, for all employees engaged in the performance of contracts with agencies of the United States Government, subject to the provisions of the Walsh-Healey Public Contracts Act, and supersede rates determined for the industry in 1939.² The amended determination brings the rates of pay for the two branches of the furniture industry under the Public Contracts Act into line with those established under the Fair Labor Standards Act.



MINIMUM SUGARCANE WAGE RATES IN VIRGIN ISLANDS

A DETERMINATION of fair and reasonable wage rates for persons employed in the production, cultivation, or harvesting of sugarcane in the Virgin Islands during the year 1942 was issued by the United States Department of Agriculture July 21, 1942.³

For all workers engaged in the harvesting of sugarcane, the rate is fixed at not less than \$1.36 per 8-hour day, or if the working day is longer or shorter than 8 hours, at not less than 17 cents an hour. In the production and cultivation of sugarcane the rate is fixed at not less than \$1.04 for an 8-hour day, or for longer or shorter periods at not less than 13 cents an hour. Persons employed on a piece-rate basis must be paid rates yielding not less than the above amounts.

Producers are required to furnish, without charge, the perquisites they customarily supply, such as a dwelling, garden plot, pasture lot, and medical service, and a producer may not, through any subterfuge or device whatsoever, reduce the wage rates to laborers below those fixed by the determination.

No producer may qualify for a payment under the Sugar Act of 1937 as amended, who has not paid in full the amount agreed upon between him and the laborer.

¹ U. S. Department of Labor. Division of Public Contracts, Press release No. 381-42.

² See Monthly Labor Review, issue of October 1940 (p. 815).

³ Federal Register, Washington, July 23, 1942.

Labor Turn-over

LABOR TURN-OVER IN MANUFACTURING JUNE 1942

AS total employment in manufacturing establishments in June reached a new all-time high and job opportunities became more widespread, the quit rate also rose to a new peak of 3.85 per 100 employees. The shift of workers to new jobs offering higher wages or better working conditions accounts primarily for the high quit rate. In certain areas inadequate housing and transportation facilities continued to be the factors in the excessively high quit rate which was almost double that of June 1941. In the 7 selected war industries for which only quit rates are published, shipbuilding and aluminum continued to show substantial increases over the preceding month.

TABLE 1.—Monthly Labor Turn-Over Rates of Factory Workers in Representative Establishments in 135 Industries ¹

Class of turn-over and year	January	February	March	April	May	June	July	August	September	October	November	December	Average
Separations:													
Quits:													
1942.....	2.36	2.41	3.02	3.59	3.77	3.85							
1941.....	1.31	1.33	1.70	2.08	2.20	2.06	2.25	2.46	2.81	2.11	1.57	1.75	1.97
Discharges:													
1942.....	.30	.29	.33	.35	.38	.38							
1941.....	.18	.19	.21	.25	.24	.26	.29	.30	.31	.28	.24	.29	.25
Lay-offs: ²													
1942.....	1.61	1.39	1.19	1.31	1.43	1.21							
1941.....	1.61	1.20	1.06	1.19	1.08	1.03	1.40	1.13	1.16	1.41	1.44	2.15	1.32
Miscellaneous separations: ³													
1942.....	.83	.73	.82	.87	.96	1.02							
1941.....	.31	.43	.43	.37	.34	.36	.30	.25	.25	.33	.26	.52	.35
Total:													
1942.....	5.10	4.82	5.36	6.12	6.54	6.46							
1941.....	3.41	3.15	3.40	3.89	3.86	3.71	4.24	4.14	4.53	4.13	3.51	4.71	3.89
Accessions:													
Rehirings:													
1942.....	1.41	1.03	1.18	1.11	1.07	1.12							
1941.....	1.45	1.08	1.24	1.04	.92	.90	1.04	1.11	.87	.86	.79	.94	1.02
New hirings:													
1942.....	5.46	4.99	5.81	6.01	6.22	7.13							
1941.....	4.09	3.84	4.38	5.00	5.03	5.41	4.96	4.32	4.29	4.01	3.12	3.82	4.36
Total:													
1942.....	6.87	6.02	6.99	7.12	7.29	8.25							
1941.....	5.54	4.92	5.62	6.04	5.95	6.31	6.00	5.43	5.16	4.87	3.91	4.76	5.38

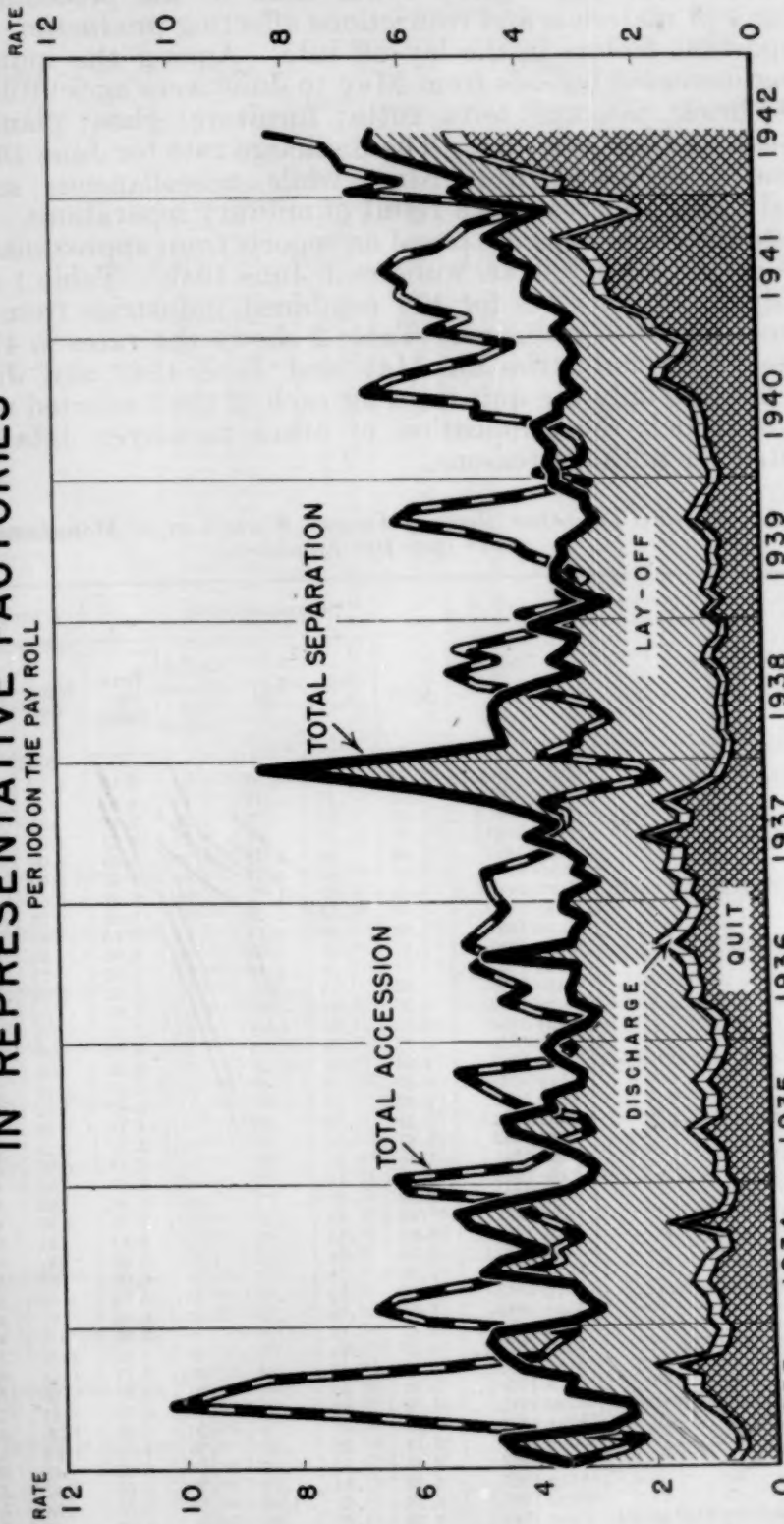
¹ The various turn-over rates represent the number of quits, discharges, lay-offs, total separations, and accessions per 100 employees. It should be noted that turn-over rates are not directly comparable to the "employment and pay-roll" reports issued by the Bureau of Labor Statistics. Turn-over rates are based on data for the entire month, while employment and pay-roll indexes refer only to the pay period ending nearest the middle of the month. Certain seasonal industries, such as canning and preserving, are not covered by the labor turn-over survey. Finally, the coverage of the labor turn-over sample is not as extensive as that of the employment sample, which includes a greater number of small plants.

² Including temporary, indeterminate, and permanent lay-offs.

³ Military separations included.

⁴ Revised.

LABOR TURN-OVER RATES IN REPRESENTATIVE FACTORIES PER 100 ON THE PAY ROLL



UNITED STATES BUREAU OF LABOR STATISTICS

Lay-offs in June 1942 were 1.21 per 100 wage earners as compared with 1.43 in May 1942 and 1.03 in June of last year. Although the June 1942 level was slightly lower than in the preceding month, shortages of materials and restrictions affecting production continued as important factors in the lay-off rate. Among the industries reporting increased lay-offs from May to June were agricultural implements; brick, tile, and terra cotta; furniture; glass; planing mills; and book and job printing. The discharge rate for June 1942 (0.38) remained unchanged from May, while miscellaneous separations showed a slight increase as a result of military separations.

These turn-over data are based on reports from approximately 8,700 plants employing 4,400,000 workers in June 1942. Table 1 shows the monthly turn-over rates for 135 combined industries from January 1941 to June 1942, inclusive. Table 2 shows the rates in 42 selected manufacturing industries for May and June 1942 and June 1941. Table 3 shows only the quit rates for each of the 7 selected war industries for which the publication of other turn-over data has been restricted for military reasons.

TABLE 2.—Monthly Turn-Over Rates of Factory Workers in 42 Manufacturing Industries¹ (per 100 Employees)

Industry	Date	Separation rates					Accession rates		
		Quit	Discharge	Lay-off	Miscellaneous separation ²	Total separation	Rehiring	New hiring	Total accession
Agricultural implements.....	June 1942...	1.84	0.35	2.03	0.94	5.16	0.72	5.52	6.24
	May 1942...	2.33	.34	1.12	1.10	4.89	.31	4.84	5.15
	June 1941...	1.05	.25	.75	.29	2.34	.49	2.91	3.40
Automobiles and bodies.....	June 1942...	1.97	.19	.88	1.23	4.27	3.97	5.75	9.72
	May 1942...	1.88	.20	1.75	1.26	5.09	4.00	4.09	8.09
	June 1941...	1.81	.13	2.13	.88	4.95	1.02	3.36	4.38
Automobile parts and equipment.....	June 1942...	3.44	.57	1.30	.91	6.22	1.56	7.93	9.49
	May 1942...	2.41	.52	1.22	.93	5.08	1.23	5.89	7.12
	June 1941...	1.98	.40	4.15	.43	6.96	.65	5.14	5.79
Boots and shoes.....	June 1942...	3.91	.21	1.03	.79	5.94	.91	4.54	5.45
	May 1942...	3.77	.28	1.16	.72	5.93	.73	4.00	4.73
	June 1941...	1.89	.14	.74	.25	3.02	1.52	4.71	6.23
Boxes, paper.....	June 1942...	5.27	.44	.88	1.05	7.64	.53	5.06	5.59
	May 1942...	4.75	.64	.99	.83	7.21	.78	4.38	5.16
	June 1941...	2.77	.49	.38	.25	3.89	.61	7.95	8.56
Brick, tile, and terra cotta.....	June 1942...	4.94	.41	2.70	.75	8.80	.56	6.65	7.21
	May 1942...	3.67	.25	1.15	.58	5.65	.99	5.57	6.56
	June 1941...	2.22	.23	1.10	.32	3.87	.89	6.99	7.88
Cast-iron pipe.....	June 1942...	2.21	.34	.82	.73	4.10	1.30	4.32	5.62
	May 1942...	1.87	.24	.67	.59	3.37	1.21	2.29	3.50
	June 1941...	1.48	.35	.28	.24	2.35	1.97	3.26	5.23
Cement.....	June 1942...	2.29	.19	.31	.71	3.50	.88	4.76	5.64
	May 1942...	2.59	.21	.69	.55	4.04	.99	4.47	5.46
	June 1941...	.98	.12	.23	.37	1.70	.33	4.81	5.14
Chemicals.....	June 1942...	2.85	.44	.92	1.12	5.33	.44	6.39	6.83
	May 1942...	2.79	.51	1.32	1.03	5.65	.31	5.16	5.47
	June 1941...	1.90	.23	.41	.46	3.00	.67	5.57	6.24
Cigars and cigarettes.....	June 1942...	4.75	.12	.51	.44	5.82	1.08	6.38	7.46
	May 1942...	5.65	.18	.38	.23	6.44	.77	4.18	4.95
	June 1941...	2.45	.11	1.19	.18	3.93	.65	4.22	4.87
Cotton manufacturing.....	June 1942...	6.10	.44	.71	.69	7.94	1.58	7.26	8.84
	May 1942...	5.92	.42	.84	.59	7.77	1.53	6.63	8.16
	June 1941...	3.70	.36	.75	.30	5.11	1.38	5.33	6.71
Dyeing and finishing textiles.....	June 1942...	5.78	.81	.99	.78	8.36	1.23	7.84	9.07
	May 1942...	5.55	.56	.71	.76	7.58	1.20	6.22	7.42
	June 1941...	3.71	.29	.45	.39	4.84	1.33	5.53	6.86
Flour.....	June 1942...	4.45	.59	.55	.76	6.35	.48	8.94	9.42
	May 1942...	4.23	.34	.72	.70	5.99	.47	5.73	6.20
	June 1941...	1.73	.31	1.16	.50	3.70	.64	6.18	6.82
Foundries and machine shops.....	June 1942...	3.75	.57	.75	1.00	6.07	.71	8.17	8.88
	May 1942...	3.80	.55	1.21	.86	6.42	.75	6.96	7.71
	June 1941...	2.44	.46	.85	.39	4.14	.49	6.63	7.12

¹ No individual industry data shown unless reports cover at least 25 percent of industrial employment.

² Military separations included.

TABLE 2.—Monthly Turn-Over Rates of Factory Workers in 42 Manufacturing Industries (per 100 Employees)—Continued

Industry	Date	Separation rates					Accession rates		
		Quit	Dis-charge	Lay-off	Miscellaneous separation	Total separation	Rehir-ing	New hiring	Total accession
Furniture.....	June 1942.....	5.71	0.52	3.04	1.07	10.34	1.01	7.53	8.54
	May 1942.....	5.97	.44	2.49	.80	9.70	1.22	7.62	8.84
	June 1941.....	3.49	.48	.69	.42	5.08	.99	7.51	8.50
Glass.....	June 1942.....	2.92	.26	2.04	1.16	6.38	1.36	4.98	6.34
	May 1942.....	2.89	.38	1.56	.99	5.82	1.10	3.89	4.99
	June 1941.....	1.21	.16	1.21	.36	2.94	.88	3.84	4.72
Hardware.....	June 1942.....	5.06	.50	1.20	.87	7.63	1.00	5.49	6.49
	May 1942.....	5.29	.37	1.36	.66	7.68	.56	5.08	5.64
	June 1941.....	3.16	.36	.49	.41	4.42	.63	5.39	6.02
Iron and steel.....	June 1942.....	2.72	.17	.35	1.25	4.49	.61	4.42	5.03
	May 1942.....	2.51	.15	.45	1.13	4.24	.56	3.82	4.38
	June 1941.....	.99	.13	.19	.48	1.79	.53	3.44	3.97
Knit goods.....	June 1942.....	3.78	.26	1.09	.42	5.55	.68	3.91	4.59
	May 1942.....	4.74	.24	1.05	.36	6.39	.74	3.60	4.34
	June 1941.....	2.20	.24	.74	.23	3.41	.85	3.59	4.44
Leather.....	June 1942.....	2.92	.16	.90	.77	4.75	.55	3.43	3.98
	May 1942.....	3.25	.22	1.17	.58	5.22	.36	3.41	3.77
	June 1941.....	1.43	.21	.45	.44	2.53	.62	4.05	4.67
Lighting equipment.....	June 1942.....	3.26	.24	4.81	1.19	9.50	2.04	8.85	10.89
	May 1942.....	4.55	.23	9.12	1.19	15.09	1.42	8.46	9.88
	June 1941.....	2.21	.23	.31	.39	3.14	.49	5.42	5.91
Men's clothing.....	June 1942.....	3.40	.32	2.67	.30	6.69	1.19	3.69	4.88
	May 1942.....	3.56	.30	2.08	.24	6.18	.75	3.66	4.41
	June 1941.....	1.70	.16	1.31	.13	3.30	.98	3.32	4.30
Paints and varnishes.....	June 1942.....	3.83	.37	1.65	1.26	7.11	.45	5.05	5.50
	May 1942.....	3.55	.32	1.24	.90	6.01	.39	4.11	4.50
	June 1941.....	1.69	.28	.62	.32	2.91	.29	4.86	5.15
Paper and pulp.....	June 1942.....	4.67	.36	.96	.98	6.97	.45	5.29	5.74
	May 1942.....	3.99	.33	.90	.87	6.09	.47	4.99	5.46
	June 1941.....	1.43	.31	.72	.35	2.81	.31	4.68	4.99
Petroleum refining.....	June 1942.....	1.38	.10	.73	.77	2.98	.38	3.32	3.70
	May 1942.....	1.10	.15	.54	.71	2.50	.16	2.49	2.65
	June 1941.....	.49	.06	.66	.40	1.61	.30	3.62	3.92
Planing mills.....	June 1942.....	6.57	.59	2.52	.97	10.65	1.95	10.59	12.54
	May 1942.....	7.22	.68	1.07	1.17	10.14	1.95	8.78	10.73
	June 1941.....	2.72	.33	3.49	.42	6.96	.81	6.21	7.02
Printing: Book and job.....	June 1942.....	3.04	.25	3.56	.62	7.47	1.11	4.32	5.43
	May 1942.....	3.23	.17	2.54	.56	6.50	1.42	3.44	4.86
	June 1941.....	1.64	.27	2.62	.29	4.82	1.21	5.00	6.21
Printing: Newspapers and periodicals.....	June 1942.....	.93	.16	.99	.51	2.59	.56	1.87	2.43
	May 1942.....	.86	.24	.90	.59	2.59	.66	1.38	2.04
	June 1941.....	.73	.05	.92	.18	1.88	.60	1.38	1.98
Radios and phonographs.....	June 1942.....	5.05	.50	1.00	.87	7.42	1.25	9.67	10.92
	May 1942.....	3.37	.46	2.05	.75	6.63	.56	7.23	7.79
	June 1941.....	3.07	.24	1.30	.21	4.82	1.05	5.90	6.95
Rayon and allied products.....	June 1942.....	1.62	.17	.48	.88	3.15	.23	3.66	3.89
	May 1942.....	1.67	.22	.29	.64	2.82	.20	3.03	3.23
	June 1941.....	.92	.20	.58	.45	2.15	.49	3.04	3.53
Rubber boots and shoes.....	June 1942.....	5.22	.23	.48	1.28	7.21	3.45	9.11	12.56
	May 1942.....	4.07	.38	4.77	.80	10.02	.88	4.70	5.58
	June 1941.....	3.23	.22	.22	.90	4.57	1.06	7.35	8.41
Rubber tires.....	June 1942.....	2.40	.21	1.25	1.17	5.03	1.29	10.92	12.21
	May 1942.....	2.24	.13	1.82	.81	5.00	1.70	8.08	9.78
	June 1941.....	1.30	.12	.43	.50	2.35	.43	5.60	6.03
Sawmills.....	June 1942.....	8.02	.44	1.36	1.17	10.99	1.42	10.40	11.82
	May 1942.....	8.25	.63	1.26	1.00	11.14	1.35	9.15	10.50
	June 1941.....	2.89	.35	1.10	.29	4.63	1.87	5.78	7.65
Silk and rayon goods.....	June 1942.....	5.20	.58	1.34	.62	7.74	.92	6.18	7.10
	May 1942.....	5.35	.43	1.06	1.13	7.97	.94	6.08	7.02
	June 1941.....	3.35	.17	1.06	.25	4.83	1.16	4.50	5.66
Slaughtering and meat pack-ing.....	June 1942.....	4.26	.45	3.17	1.22	9.10	3.68	10.64	14.32
	May 1942.....	3.63	.46	4.43	1.33	9.85	4.93	8.80	13.73
	June 1941.....	1.60	.25	4.92	.45	7.22	4.05	6.54	10.59
Stamped and enameled ware.....	June 1942.....	5.08	.60	3.12	1.98	10.78	1.15	7.19	8.34
	May 1942.....	5.47	.50	2.74	.98	9.69	1.52	6.14	7.66
	June 1941.....	3.25	.71	.57	.65	5.18	.34	7.35	7.69
Steam and hot-water heating apparatus.....	June 1942.....	3.98	.56	.93	1.17	6.64	.63	5.95	6.58
	May 1942.....	2.33	.27	.59	1.11	4.30	.37	4.28	4.65
	June 1941.....	3.18	.42	.21	.34	4.15	.46	5.33	5.79
Stoves.....	June 1942.....	3.54	.44	3.11	.80	7.89	1.72	7.12	8.84
	May 1942.....	5.13	.44	3.80	.84	10.21	1.91	4.40	6.31
	June 1941.....	2.28	.19	3.69	.46	6.62	.40	5.96	6.36
Structural and ornamental metalwork.....	June 1942.....	4.78	.56	1.31	1.00	7.65	.61	9.61	10.22
	May 1942.....	4.14	.64	2.46	.80	8.04	.91	8.18	9.09
	June 1941.....	2.16	.31	.49	.47	3.43	.80	5.74	6.54

TABLE 2.—*Monthly Turn-Over Rates of Factory Workers in 42 Manufacturing Industries (per 100 Employees)*—Continued

Industry	Date	Separation rates					Accession rates		
		Quit	Dis-charge	Lay-off	Miscellaneous separation	Total separation	Rehir-ing	New hiring	Total accession
Textile machinery.....	June 1942.....	3.83	0.16	0.44	0.93	5.36	1.27	4.39	5.66
	May 1942.....	3.20	.20	1.59	.85	5.84	.28	4.45	4.73
Tools (not including edge tools, machine tools, files, and saws).....	June 1941.....	2.09	.26	.14	.22	2.71	.28	5.82	6.10
	June 1942.....	4.53	.58	.45	.89	6.45	.87	5.55	6.42
Woolen and worsted goods.....	May 1942.....	4.59	.60	.45	.89	6.53	.35	5.02	5.37
	June 1941.....	2.38	.24	.13	.33	3.08	.17	5.22	5.39
	June 1942.....	4.54	.26	1.32	.78	6.90	1.05	5.52	6.57
	May 1942.....	4.74	.23	1.01	.77	6.75	1.51	4.87	6.38
	June 1941.....	3.10	.19	.57	.25	4.11	1.20	4.41	5.61

In table 3 are given the quit rates for strategic war industries for which the publication of turn-over data has been restricted.

TABLE 3.—*Monthly Quit Rates (per 100 Employees) in Selected War Industries*

Industry	Quit rates		
	1942: June	1942: May	1941: June
Aircraft.....	3.60	4.06	2.33
Aluminum.....	3.88	3.48	2.44
Brass, bronze, and copper products.....	3.15	3.41	2.03
Electrical machinery.....	2.27	2.26	1.62
Engines and turbines.....	1.50	1.71	1.72
Machine tools.....	2.86	3.17	1.99
Shipbuilding.....	5.71	5.20	2.37

Building Operations

ESTIMATED CONSTRUCTION ACTIVITY IN CONTINENTAL UNITED STATES, 1939-42¹

Outlook for 1942

FACED with the necessity of providing facilities for the largest army and navy in the history of the United States and for an expansion in industrial plants capable of producing the weapons needed for war, the construction industry in 1942 will put in place in continental United States work valued at approximately 11.2 billion dollars.

The Bureau of Labor Statistics estimates that 70 percent of the new construction expenditures during the year will be from public funds, of which approximately 73 percent will be for military installations and Federally financed industrial facilities. Conservation and development work, much of which is essential to the war effort, will account for about 6 percent of the public expenditures in 1942. Highway construction has been curtailed considerably from 1941 and in 1942 will total not more than 700 million dollars or about 9 percent of all public construction. The volume of public war housing is expected to reach about 600 million dollars as compared with 442 million in 1941. The remaining 4 percent of public construction outlays will be for public nonresidential buildings, essential public-service enterprises such as water supply, sewage disposal, transit, and electric light and power systems, and a small amount for other Federal construction.

Private construction has been sharply reduced from the 1941 level and will total about 3.4 billion dollars in 1942. Nonfarm residential construction will account for approximately 44 percent of this amount and nonresidential about 14 percent. Construction on farms, the greater part of which is necessary because of the greater demands upon agriculture, is expected to increase to 750 million dollars in 1942, constituting 22 percent of total private construction for the year. The remainder of the private building expenditures—about 20 percent—will be for essential public-utility construction.

Construction Activity, 1939-41

The changes in the construction industry and the shifts from one type of construction to another resulting from the war are brought out by the Bureau of Labor Statistics' new series of quarterly construction activity estimates. In 1939 new construction expenditures totaled 6,451 million dollars and of this amount 60 percent represented expenditures for private construction. New construction expenditures in 1940 rose to 7,299 million dollars, with private activity increasing to 63 percent of the total. As the country drew closer to

¹ Prepared by Clarence A. Trump, under the supervision of Herman B. Byer, chief of the Bureau's Division of Construction and Public Employment.

actual participation in the war, in 1941, construction outlays increased to 10,969 million dollars. Private activity showed an increase of more than a billion dollars over the preceding year but at the same time it accounted for only 52 percent of total activity as compared with 63 percent in 1940.

PRIVATE CONSTRUCTION

The effect of munitions orders from France and England in the early days of the war is reflected by construction expenditures for privately financed industrial facilities. These expenditures amounted to only 37 million dollars in the first quarter of 1939 but rose to a rate of 81 million dollars a quarter in the last half of the year. In 1940 the quarterly rate of expenditures for industrial facilities reached 104 million dollars, with outlays amounting to 137 million dollars in the last quarter. Private expenditures for industrial facilities increased further in 1941, but in the last half of the year the quarterly rate of expenditures had turned downward. Expenditures for privately financed industrial facilities increased from 7 percent of total private construction expenditures in 1939 to more than 10 percent in 1941.

Expenditures for commercial and other types of private nonresidential building increased at approximately the same rate as total private expenditures from 1939 through 1941. Disbursements for all nonresidential building construction, including industrial facilities, constituted 20 percent of the total private expenditure in 1939 and 22 percent in 1940 and 1941.

Private construction of transportation, light, power, and communication facilities made up approximately 14 percent of total private outlays in each of the 3 years. Railroad and electric light and power expenditures made up the greater part of this work. Farm construction expenditures² for both operators' dwellings and service buildings rose at approximately the same rate as total private construction expenditures from 1939 through 1941, accounting for 13 percent of the total in 1941.

PUBLIC CONSTRUCTION

Public-construction expenditures in 1939 amounted to 2,573 million dollars and constituted 40 percent of the money spent for total new construction. In 1940, with highway, military and naval, and residential construction showing substantial increases, public construction rose to 2,695 million dollars although declining to 37 percent of total new construction activity. Owing to the rapid increase in spending for military and naval installations and industrial facilities in 1941, public outlays rose to 5,302 million dollars, or almost half of the total for new construction.

Highway-construction expenditures showed a gradual increase through the 3 years 1939-1941, which was accounted for largely by rising expenditures for State highways. The total spent for county and municipal highways increased only slightly.

The construction of sewage-disposal and water-supply systems, a substantial part of which was financed through Federal loans and grants in recent years, showed the effects of the 1938 PWA program. Expenditures for this type of work declined from 250 million dollars in

² Estimated by the Bureau of Agricultural Economics.

1939 to 149 million in 1940 and 120 million in 1941. Disbursements for publicly financed residential construction, which totaled 72 million dollars in 1939, were more than doubled in 1940 and rose to 442 million in 1941 as a result of the public war housing program.

Public nonresidential construction activity maintained a relatively high level through the first three quarters of 1939 as a result of the carry-over from the 1938 PWA program. From the fourth quarter of 1939 through the third quarter of 1940, the quarterly rate of expenditures for nonresidential construction averaged 120 million dollars. Then, as the tremendous expansion of industrial facilities began in the third quarter of 1940, expenditures for nonresidential construction reached a high of 486 million dollars in the third quarter of 1941 and totaled 1,500 million for the year.

Military and naval construction expenditures averaged about 30 million dollars a quarter for 1939 and the first 6 months of 1940. After the fall of France in June 1940 outlays for these purposes increased sharply and by the last quarter had reached a rate of 370 million dollars. The amounts thus spent continued to increase through the first quarter of 1941 but, with the completion of a large part of the cantonment program, dropped to 378 million dollars in the second quarter. Total military and naval construction expenditures for the year amounted to 1,710 million dollars.

Conservation and development work by the Bureau of Reclamation, Army Engineers, Tennessee Valley Authority, and other agencies showed a steady increase throughout the 1939-41 period, reaching a total of 376 million dollars in 1941.

Construction expenditures for miscellaneous public-service enterprises such as electric light and power, rapid transit systems, ports, harbors, airports, and terminals amounted to 88 million dollars in 1939, 90 million in 1940, and 110 million in 1941.

Estimated New Construction Activity in Continental

[In millions]

Function and ownership	1939					1940				
	Total	1st quarter	2d quarter	3d quarter	4th quarter	Total	1st quarter	2d quarter	3d quarter	4th quarter
Total new construction.....	6,451	1,225	1,686	1,930	1,610	7,299	1,212	1,732	2,126	2,229
Private construction.....	3,878	722	995	1,172	989	4,604	790	1,160	1,410	1,244
Residential (nonfarm) ¹	2,046	427	528	559	532	2,359	420	596	691	652
Net nonresidential building.....	768	145	179	218	226	1,015	177	241	282	315
Commercial.....	307	58	70	87	92	384	77	95	105	107
Industrial.....	262	37	63	81	81	415	59	102	117	137
All other.....	228	55	53	59	61	250	47	52	70	81
Deduct nonresidential building by privately owned utilities.....	29	5	7	9	8	34	6	8	10	10
Farm construction: ⁴										
Operators' dwellings.....	235	24	70	106	35	250	25	70	112	43
Service buildings.....	295	30	88	133	44	320	32	90	144	54
Public-utility construction.....	534	96	130	156	152	660	136	163	181	180
Railroad.....	137	23	36	42	36	167	28	44	52	43
Street railway.....	35	6	9	11	9	34	6	9	10	9
Pipeline.....	35	6	4	10	15	31	6	4	9	13
Electric light and power.....	188	32	48	55	53	235	58	62	56	59
Gas.....	44	8	10	14	12	70	13	15	23	19
Telephone and telegraph.....	95	21	23	24	27	123	25	29	31	37
Public construction.....	2,573	503	691	758	621	2,695	422	572	716	985
Highway.....	872	148	218	281	225	932	121	241	329	241
State.....	477	81	119	154	123	530	69	137	187	137
County.....	161	27	40	52	42	163	21	42	58	42
Municipal.....	234	40	59	75	60	239	31	62	84	62
Sewage disposal.....	130	26	38	36	30	87	28	23	19	17
Water supply.....	120	24	35	34	27	62	20	17	13	12
Residential ⁵	72	5	11	22	34	202	29	51	60	62
Nonresidential.....	834	191	264	233	146	495	108	108	119	160
Commercial.....	23	4	5	7	7	24	5	6	6	7
Industrial ⁶	20	3	5	6	6	130	10	10	24	86
All other.....	791	184	254	220	133	341	93	92	89	67
Military and naval ⁷	128	26	30	33	39	481	25	30	56	370
Conservation and development.....	309	64	68	87	90	311	64	71	87	89
Bureau of Reclamation.....	72	18	19	17	18	74	15	18	21	20
Army Engineers ⁸	156	30	31	47	48	158	32	36	43	47
Tennessee Valley Authority.....	32	7	7	8	10	38	8	8	10	12
Other ⁹	49	9	11	15	14	41	9	9	13	10
Miscellaneous public-service enterprises:										
Rapid transit.....	19	3	5	6	5	17	3	4	5	5
Municipal electric light and power.....	24	4	6	7	7	26	6	7	6	7
Public-service enterprises not elsewhere included. ¹⁰	45	8	12	13	12	47	10	12	13	12
All other Federal.....	20	4	4	6	6	35	8	8	9	10

¹ The estimates include expenditures for new construction in the continental United States. They do not include work relief construction expenditures or maintenance expenditures. The estimates do include expenditures for major additions and alterations.

² Bureau of Labor Statistics' forecast.

³ The residential totals have been adjusted to the new levels indicated by the 1939 Census of Housing.

⁴ Estimated by Bureau of Agricultural Economics through 1941. Forecast for 1942 by Bureau of Labor Statistics.

⁵ Inc
⁶ Inc
⁷ Do
⁸ Riv
⁹ Inc
structi
¹⁰ Inc

United States, 1939 Through 1942, by Quarters ¹

(of dollars)

	1941					1942				Function and ownership
	Total	1st quarter	2d quarter	3d quarter	4th quarter	Total ²	1st quarter	2d quarter	Balance of 1942 ³	
10,969	2,043	2,729	3,334	2,863	11,179	2,634	3,418	5,127		Total new construction.
5,667	973	1,456	1,808	1,430	3,404	958	1,073	1,373		Private construction.
2,881	508	740	902	731	1,500	468	477	555		Residential (nonfarm). ⁴
1,244	250	343	345	306	460	200	151	109		Net nonresidential building.
315	436	86	104	131	115	156	77	57		Commercial.
107	585	107	181	156	141	223	89	69		Industrial.
137	273	65	70	73	65	125	46	39		All other.
81	50	8	12	15	15	44	12	14		Deduct nonresidential building by privately owned utilities.
10										
43	300	30	75	135	60	310	46	102	162	Farm construction: ⁴
54	415	41	104	187	83	440	66	145	229	Operators' dwellings.
										Service buildings.
180	827	144	194	239	250	694	178	198	318	Public-utility construction.
43	187	30	49	56	52	190	34	57	99	Railroad.
9	20	3	5	6	6	17	3	5	9	Street railway.
13	65	12	8	18	27	54	14	8	32	Pipeline.
59	299	50	71	86	92	252	65	76	111	Electric light and power.
19	74	13	16	24	21	50	16	14	20	Gas.
37	182	36	45	49	52	131	46	38	47	Telephone and telegraph.
985	5,302	1,070	1,273	1,526	1,433	7,775	1,676	2,345	3,754	Public construction.
241	999	140	264	347	248	700	129	220	351	Highway.
137	584	82	154	203	145	420	78	129	213	State.
42	170	24	45	59	42	112	22	39	51	County.
62	245	34	65	85	61	168	29	52	87	Municipal.
17	70	17	19	19	15	47	12	14	21	Sewage disposal.
12	50	12	14	14	10	38	8	11	19	Water supply.
62	442	57	127	136	122	600	91	135	374	Residential. ⁵
160	1,500	197	342	486	475	2,640	691	763	1,186	Nonresidential.
7	14	3	3	4	4	5	2	2	1	Commercial.
86	1,236	140	280	407	409	2,500	644	720	1,136	Industrial. ⁶
67	250	54	59	75	62	135	45	41	49	All other.
370	1,710	537	378	381	414	3,200	621	1,066	1,513	Military and naval. ⁷
89	376	80	91	99	106	451	97	110	244	Conservation and development.
20	79	19	20	20	20	80	21	24	35	Bureau of Reclamation.
47	180	38	44	48	50	200	43	48	109	Army Engineers. ⁸
12	83	13	17	23	30	125	31	35	59	Tennessee Valley Authority.
10	34	10	10	8	6	46	2	3	41	Other. ⁹
5	10	2	2	3	3	8	2	2	4	Miscellaneous public-service enterprises.
7	42	6	10	12	14	31	8	9	14	Rapid transit.
										Municipal electric light and power.
12	58	12	15	17	14	38	9	10	19	Public-service enterprises not elsewhere included. ¹⁰
10	45	10	11	12	12	22	8	5	9	All other Federal.

¹ Includes war housing.² Includes war and nonwar industrial facilities.³ Does not include industrial facilities or war housing.⁴ River, harbor, and flood control work.⁵ Includes Indian Service, Forest Service, National Park Service, and Soil Conservation Service construction expenditures.⁶ Includes municipal enterprises such as ports, harbors, airports, terminals, etc.

NEW DWELLING UNITS IN NONFARM AREAS, FIRST HALF OF 1942¹*Summary*

CONSTRUCTION of new residential buildings for 302,000 nonfarm families was started during the first 6 months of 1942, a decrease of 18 percent from the number started during the same period of 1941. This drop resulted from a 38-percent decrease in construction by private builders, which was largely due to the War Production Board's order of April 9, halting all but the most essential construction. Although during the first 3 months of 1942 less than 40 percent of the 111,000 dwelling units put under construction by private builders had priority ratings for building materials from the War Production Board, during the second quarter over 70 percent of the 83,000 units started had priority ratings.

Publicly financed projects for which construction contracts were awarded during the first 6 months of 1942 will provide accommodations for 107,952 families, or 36 percent of the nonfarm total, and almost twice as many as were provided in the first 6 months of 1941. All but 1,965 units were under the jurisdiction of the Federal Public Housing Authority of the National Housing Agency and are reserved for war workers. During the first 6 months of 1941, 54,555 units, of which 48,859 were reserved for war workers, were put under construction contract in publicly financed projects. By the end of June 1942 the Federally financed war housing program had completed or had under construction contract a total of 226,788 dwelling units in continental United States, not including dormitories, trailers, or portable units.

Two-family dwelling units showed the greatest decrease, 31 percent, from the number for the first 6 months of 1941, while 1-family and multifamily dwelling units decreased 18 percent and 15 percent, respectively. In the first quarter of 1942, an unusually large proportion of multifamily units were put under construction contract in public projects, but this was offset in the second quarter by the large number of 1-family demountable units put under contract for these projects. One-family dwellings comprised approximately 85 percent of the total for the first half of 1942, 2-family dwellings accounted for 4 percent, and apartment houses for 11 percent; this was not greatly different from the distribution for the first half of 1941.

Scope of Report

The "nonfarm area" of the United States consists of the aggregate of urban and rural nonfarm places. The urban designation is applied to all incorporated places with 1940 population of 2,500 or greater, and also, by special rule, to a small number of unincorporated civil divisions. In the class of rural nonfarm construction is placed all activity for nonagricultural use in unincorporated areas and in incorporated places of less than 2,500 population. Thus, whereas urban construction actually corresponds to a definite area, rural nonfarm construction depends for its classification upon the intended use of the individual buildings.

¹ Prepared by George Schumm, of the Bureau's Division of Construction and Public Employment, under the supervision of Herman B. Byer, chief.

Building-permit reports collected by the Bureau of Labor Statistics have provided the basic information for current estimates of residential construction. The Bureau began the regular collection of these data in 1920, at first including only the larger cities. Since that time coverage has been steadily expanded until it now includes more than 2,400 cities and 1,000 rural incorporated places. In addition, since 1939 a small number of counties have reported on building permits issued in their unincorporated areas. A valuable supplementary source of information, particularly valuable in preparing rural estimates, is the Defense Housing Survey, a joint enterprise of the Bureau of Labor Statistics, the National Housing Agency, and the Work Projects Administration. Since building permits are issued when construction work is about to start, estimates derived from permits represent the future dwelling-unit capacity of buildings upon which construction was started in the period specified. No attempt is made here to estimate the number of family accommodations gained by alterations and conversions or those lost by demolition.

Volume of New Residential Construction

Building permits issued in nonfarm areas and contracts awarded for public housing indicate that construction was started on approximately 302,000 new family-dwelling units during the first 6 months of 1942. This represented a decrease of 18 percent from the total during the first 6 months of 1941.

Uncertainty with regard to the materials situation, and the form that imminent governmental restrictions would take, caused many private builders to curtail their operations during the first quarter of 1942. On April 9, the War Production Board issued Conservation Order L-41, prohibiting the start of any new residential construction without priorities approval (or special permission where priorities assistance was not needed), excepting only construction with an estimated cost under \$500 over any continuous 12-month period or construction to replace structures "destroyed after December 31, 1941, by fire, flood, tornado, earthquake, act of God, or the public enemy." As a result, only 82,600 privately financed new dwelling units were put under construction during April, May, and June of 1942 as compared to approximately 191,000 during the same period of 1941 and 111,000 during the first quarter of 1942.

Between September 1941 and June 30, 1942, applications for priorities covering 277,000 dwelling units were approved by WPB and work was in progress or completed on approximately 159,000 of them. This included 40,000 units started before September 1941 which needed priorities assistance for completion.

Exact figures on the number of units started with priority aid during the first 3 months of 1942 are not available. However, from data released by the Federal Housing Administration, it may be estimated that the units so started did not greatly exceed 40,000. Thus, of all new privately financed units upon which construction was started during this period, less than 40 percent had priority assistance in getting materials. FHA data show that 59,000 or over 70 percent of the total privately financed units upon which construction was started during the second quarter of 1942 had priorities assistance.

All except 1,965 of the 107,952 publicly financed units put under construction contract during the first half of 1942 were under the jurisdiction of the Federal Public Housing Authority of the National Housing Agency and were designated for war workers or families of military personnel. The other publicly financed units started during this period were 1,000 units being built with Defense Plant Corporation funds near Las Vegas, Nev., for workers at the new magnesium plant; a 615-unit project being built by the New York City Housing Authority with State funds; and 350 units in two projects near Buffalo, N. Y., with State funds. During the first 6 months of 1941, 54,555 units, of which 48,859 were reserved for war workers, were put under construction contract in public projects. By the end of June 1942 the Federally financed war housing program had completed or had under construction contract 226,788 dwelling units in continental United States, not including dormitories, trailers, or portable units.

COMPARISON BY POPULATION GROUP

The rural nonfarm area showed the smallest decrease, 4 percent, from the corresponding period of 1941. Cities of 50,000 to 100,000 population showed a decrease of less than 7 percent, the smallest of any of the urban groups, while cities of 2,500 to 5,000 population and of 5,000 to 10,000 population showed the greatest decreases, 47 and 40 percent, respectively. These comparisons are greatly affected by the inclusion of publicly financed projects as shown in table 1. About one-third of the urban public total for the first 6 months of 1942 was in USHA slum-clearance projects which had been converted to war housing. For privately financed dwellings alone, in cities of 50,000 to 100,000 population, the total decreased 27 percent and the rural nonfarm total decreased 38 percent from the first 6 months of 1941. The large rural nonfarm public total, approximately 55 percent of all public units, was due to the number of projects situated just outside corporate limits of large cities. Lack of suitable sites within corporate limits, comparative costs of land and maintenance inside and outside corporate limits, and proximity to new war plants all contributed to the large rural nonfarm public total.

While public housing was being built in and near larger cities, a greater proportion of the new private housing during the first half of 1942 was in smaller urban places and less in rural nonfarm areas. Twenty-six percent of all privately financed units were in urban places of less than 50,000 population as compared to 18 percent of the public units, and 39 percent of the private total was in rural nonfarm areas as compared to 52 percent of the public total.

One-family dwellings comprised approximately 85 percent of the total construction in the first half of 1942; 2-family dwellings accounted for 4 percent; and apartment houses for 11 percent. This is about the same as the distribution in the first half of 1941. Contracts for several publicly financed projects containing a large number of multi-family units resulted in an unusually large proportion of this type of dwelling unit in the first quarter of 1942, but this was offset in the second quarter by a shift in public projects to 1-family demountable units. Details on the distribution of the new dwelling units by type and population group are given in table 2.

TABLE 1.—New Dwelling Units in Nonfarm Areas, First 6 Months of 1941 and 1942, by Population Group and Source of Funds

Area and population group (1940 census)	Total		Private funds		Public funds	
	First half of—		First half of—		First half of—	
	1942	1941	1942	1941	1942	1941
All nonfarm areas.....	301,800	368,200	193,848	313,645	107,952	54,555
Percent of change, 1941 to 1942.....	-18.0	-----	-38.2	-----	+97.9	-----
Urban (cities).....	170,700	231,700	119,190	193,023	51,510	38,677
500,000 and over.....	41,200	55,400	29,321	50,010	11,879	5,390
100,000 to 500,000.....	37,800	49,300	25,575	36,232	12,225	13,068
50,000 to 100,000.....	21,500	22,900	13,546	18,501	7,954	4,399
25,000 to 50,000.....	16,800	27,000	11,886	21,369	4,914	5,631
10,000 to 25,000.....	30,000	36,000	19,093	30,722	10,907	5,278
5,000 to 10,000.....	13,800	22,900	12,306	20,824	1,494	2,076
2,500 to 5,000.....	9,600	18,200	7,463	15,365	2,137	2,835
Rural nonfarm areas.....	131,100	136,500	74,658	120,622	56,442	15,878

TABLE 2.—New Dwelling Units in Nonfarm Areas, First 6 Months of 1941 and 1942, by Population Group and Type of Dwelling

Area and population group (1940 census)	All types		1-family		2-family ¹		Multifamily ²	
	First half of—		First half of—		First half of—		First half of—	
	1942	1941	1942	1941	1942	1941	1942	1941
All nonfarm areas.....	301,800	368,200	254,900	309,600	12,700	18,500	34,200	40,100
Percent of change 1941 to 1942.....	-18.0	-----	-17.7	-----	-31.4	-----	-14.7	-----
Urban (cities).....	170,700	231,700	128,100	179,400	11,800	15,400	30,800	36,900
500,000 and over.....	41,200	55,400	19,900	29,700	4,100	4,200	17,200	21,500
100,000 to 500,000.....	37,800	49,300	31,100	38,100	3,100	4,200	3,600	7,000
50,000 to 100,000.....	21,500	22,900	13,600	18,100	1,600	2,300	6,300	2,500
25,000 to 50,000.....	16,800	27,000	13,700	23,500	1,200	1,500	1,900	2,000
10,000 to 25,000.....	30,000	36,000	28,200	32,200	900	1,800	900	2,000
5,000 to 10,000.....	13,800	22,900	12,400	21,100	700	900	700	900
2,500 to 5,000.....	9,600	18,200	9,200	16,700	200	500	200	1,000
Rural nonfarm areas.....	131,100	136,500	126,800	130,200	900	3,100	3,400	3,200

¹ Includes 1- and 2-family dwellings with stores.² Includes multifamily dwellings with stores.

COMPARISON BY GEOGRAPHIC DIVISION

The varying numbers of additional war workers needed in different areas were largely responsible for the widely divergent experiences of the several geographic areas. While the South Atlantic and Pacific States had decreases of less than 4 percent from their totals for the first half of 1941, the New England States showed a decline of over 40 percent. New England was also the only area to show a substantial drop in public construction.

Private construction suffered heavily in all areas during the second quarter of 1942 as a result of the WPB conservation order, with decreases from the totals for the second quarter of 1941 ranging from 46 percent in the West South Central States to 73 percent in the Mountain States. The 38,000 units started by private builders in the East North Central States was the largest number started in any area during the first 6 months of 1942, but they nevertheless represented a decline of 38 percent from the first half of 1941. Demands

for war housing resulted in 32,698 public units in the South Atlantic and 30,231 units in the Pacific States, or 30 and 28 percent, respectively, of all publicly financed units put under construction contract during the first half of 1942. Further details on the number of dwelling units by source of funds during the first two quarters of 1942 and the second quarter of 1941 may be found in table 3.

TABLE 3.—*New Dwelling Units in Nonfarm Areas, Second Quarter of 1941 and First and Second Quarters of 1942, by Geographic Division and Source of Funds*

Geographic division	Total units			New dwelling units financed by—					
	Second quarter, 1942	First quarter, 1942	Second quarter, 1941	Private funds			Public funds		
				Second quarter, 1942	First quarter, 1942	Second quarter, 1941	Second quarter, 1942	First quarter, 1942	Second quarter, 1941
All divisions.....	161,000	140,800	223,100	82,602	111,246	190,842	78,398	29,554	32,258
New England.....	6,800	5,700	13,500	3,997	3,831	9,544	2,803	1,869	3,956
Middle Atlantic.....	19,100	20,200	38,300	13,692	15,270	31,196	5,408	4,930	7,104
East North Central.....	28,100	21,800	45,700	17,987	20,109	41,199	10,113	1,691	4,301
West North Central.....	10,400	7,100	15,000	5,000	7,100	13,443	5,400	.....	1,553
South Atlantic.....	38,100	29,900	38,100	15,540	19,762	32,458	22,560	10,138	5,642
East South Central.....	5,900	10,600	12,000	2,890	8,038	10,088	3,010	2,562	1,912
West South Central.....	9,800	15,000	16,800	7,975	13,522	14,806	1,825	1,478	1,994
Mountain.....	4,200	4,900	7,100	1,828	3,338	6,678	2,372	1,562	422
Pacific.....	38,600	25,600	36,600	13,693	20,276	31,430	24,907	5,324	5,178

The number of multifamily units put under construction showed a sharp decline from the first to second quarter of 1942, owing principally to the fact that although 7,500 such units were put under contract for public projects in the first quarter of 1942 for the Washington, D. C. area alone, only 108 such units were put under contract in the second quarter for the entire South Atlantic area. Private construction of multifamily units in the Middle Atlantic area, which formerly dominated the totals in this type of construction, continued to decline, with construction started on 700 such units in the second quarter as compared to 2,100 units in the first quarter. The shift in emphasis during the second quarter in public housing to more or less temporary, quickly constructed units is shown by the fact that 58,713 or 75 percent of the total units put under contract in this quarter were of the 1-family demountable type. This fact played a large part in the 28-percent increase shown by 1-family units in the second quarter over the first quarter of 1942. Table 4 presents estimates for the first and second quarters of 1942 and the second quarter of 1941, by geographic division and type of unit.

TABLE 4.—*New Dwelling Units in Nonfarm Areas, Second Quarter of 1941 and First and Second Quarters of 1942, by Geographic Division and Type of Dwelling*

Geographic division	All types			1-family			2-family ¹			Multifamily ²		
	Second quarter, 1942	First quarter, 1942	Second quarter, 1941	Second quarter, 1942	First quarter, 1942	Second quarter, 1941	Second quarter, 1942	First quarter, 1942	Second quarter, 1941	Second quarter, 1942	First quarter, 1942	Second quarter, 1941
All divisions.....	161,000	140,800	223,100	143,200	111,700	190,700	5,500	7,200	10,200	12,300	21,900	22,200
New England.....	6,800	5,700	13,500	5,300	4,700	10,200	100	300	800	1,400	700	2,500
Middle Atlantic.....	19,100	20,200	38,300	15,300	15,100	30,600	2,500	1,300	1,900	1,300	3,800	5,800
East North Central.....	28,100	21,800	45,700	26,800	19,800	41,900	800	1,200	1,500	500	800	2,300
West North Central.....	10,400	7,100	15,000	9,800	6,100	13,700	200	200	400	400	800	900
South Atlantic.....	38,100	29,900	38,100	31,800	18,700	30,800	900	1,100	1,900	5,400	10,100	5,400
East South Central.....	5,900	10,600	12,000	5,500	9,000	10,600	300	1,300	1,100	100	300	300
West South Central.....	9,800	15,000	16,800	9,400	14,100	15,400	300	700	900	100	200	500
Mountain.....	4,200	4,900	7,100	4,100	4,500	6,400	0	200	300	100	200	400
Pacific.....	38,600	25,000	36,600	35,200	19,700	31,100	400	900	1,400	3,000	5,000	4,100

¹ Includes 1- and 2-family dwellings with stores.² Includes multifamily dwellings with stores.

Estimated Permit Valuations

The permit valuations of the 302,000 new units started during the first 6 months of 1942 in nonfarm areas were estimated to aggregate approximately \$967,200,000, a decrease of 24 percent from the \$1,270,500,000 estimate for the same period of 1941. However, the number of new units dropped only 18 percent. Governmental restrictions on the cost of new units resulted in a decrease in the average unit permit valuation for privately financed units of approximately 8 percent from the average for the first half of 1941 and were primarily responsible for the disproportionate drop in permit valuations.

TABLE 5.—*Estimated Permit Valuation of New Dwellings in Nonfarm Areas, First 6 Months of 1941 and 1942, by Geographic Division and Source of Funds*

[In thousands of dollars]

Geographic divisions	Total		Private funds		Public funds ¹	
	First 6 months of—					
	1942	1941	1942	1941	1942	1941
All divisions.....	967, 182	1, 270, 266	623, 626	1, 096, 499	343, 556	173, 767
New England.....	49, 221	84, 514	31, 385	58, 092	17, 836	26, 422
Middle Atlantic.....	149, 862	244, 217	110, 179	215, 843	39, 683	28, 374
East North Central.....	185, 286	283, 442	149, 938	261, 108	35, 348	22, 334
West North Central.....	52, 281	73, 993	37, 253	66, 327	15, 028	7, 666
South Atlantic.....	202, 659	207, 565	97, 868	164, 948	104, 791	42, 617
East South Central.....	41, 982	47, 208	23, 212	39, 357	18, 770	7, 851
West South Central.....	65, 716	85, 753	56, 174	75, 622	9, 542	10, 131
Mountain.....	26, 799	33, 918	14, 206	31, 290	12, 593	2, 628
Pacific.....	193, 376	209, 656	103, 411	183, 912	89, 965	25, 744

¹ Contract values.

One-family dwellings accounted for \$828,600,000, or 85 percent of the total for the first half of 1942; two-family units for \$34,100,000 or 4 percent, and apartment houses for \$104,500,000 or 11 percent.

Permit valuations for the first 6 months of 1942 for privately financed units totaled \$623,626,000 and construction contracts awarded during this period totaled \$343,556,000. Care should be taken when comparing the private and public aggregates in table 5, since the public figures are construction contract values rather than permit valuations which understate construction costs.



SUMMARY OF BUILDING CONSTRUCTION IN PRINCIPAL CITIES, JULY 1942¹

THE 51-percent drop in building-permit valuations from July 1941 to July 1942 reflected the continuing effect of the WPB "stop construction" order. New residential building experienced the most severe curtailment—69 percent, as contrasted with decreases of 25 percent in nonresidential building and 41 percent in additions, alterations, and repairs. Although the value of Federal contracts awarded in the reporting cities was about 15 percent lower in July 1942 than a year ago, the slump in private building was more severe.

The 9-percent decline in permit valuations from June to July 1942 continued the downward trend which started early this year. The June-to-July decrease, however, was attributable primarily to the reduced volume of Federal contracts, particularly for war housing projects.

Comparison of July 1942 With July 1941 and June 1942

The volume of building construction in 2,409 identical cities with populations of 500 and over which reported to the Bureau of Labor Statistics in June and July 1942 and July 1941 is summarized in table 1.

TABLE 1.—Summary of Building Construction for Which Permits Were Issued in 2,409 Identical Cities, July 1942

Class of construction	Number of buildings			Permit valuation		
	July 1942	Percentage change from—		July 1942	Percentage change from—	
		June 1942	July 1941		June 1942	July 1941
All construction.....	52, 229	—5. 1	—41. 1	\$136, 737, 869	—9. 1	—50. 6
New residential.....	10, 153	—20. 6	—68. 0	46, 522, 060	—11. 6	—68. 9
New nonresidential.....	7, 830	—2. 2	—44. 4	68, 807, 077	—7. 1	—24. 7
Additions, alterations, and repairs.....	34, 246	(¹)	—20. 1	21, 408, 732	—10. 2	—40. 7

¹ Decrease of less than a tenth of 1 percent.

The number of new dwelling units for which permits were issued and the permit valuation of such new housekeeping residential construction in the 2,409 cities reporting in July 1942 are presented in table 2. Percentage changes between July 1942 and June 1942 and July 1941 are also shown.

¹ More detailed information by geographic divisions and population groups is contained in a separate mimeographed release entitled "Building Construction, July 1942," copies of which will be furnished upon request.

TABLE 2.—*Number and Permit Valuation of New Dwelling Units in 2,409 Identical Cities, July 1942, by Source of Funds and Type of Dwelling*

Source of funds and type of dwelling	Number of dwelling units			Permit valuation		
	July 1942	Percent of change from—		July 1942	Percent of change from—	
		June 1942	July 1941		June 1942	July 1941
All dwellings	14,164	-11.6	-63.2	\$45,782,560	-13.0	-69.2
Privately financed	12,280	+7.8	-65.2	39,709,343	+5.8	-71.1
1-family	8,138	+8.7	-69.9	26,711,233	+5.1	-76.5
2-family ¹	1,173	+12.8	-38.9	3,389,949	+15.5	-33.3
Multifamily ²	2,969	+3.5	-53.3	9,608,161	+4.5	-48.5
Publicly financed	1,884	-59.2	-41.2	6,073,217	-59.7	-46.3

¹ Includes 1- and 2-family dwellings with stores.² Includes multifamily dwellings with stores.*Comparison of First 7 Months of 1941 and 1942*

Permit valuations reported in the first 7 months of 1941 and 1942 are compared in table 3.

TABLE 3.—*Permit Valuation of Building Construction, by Class of Construction, First 7 Months of 1941 and 1942 ¹*

Class of construction	Permit valuation		
	First 7 months of—		Percent of change
	1942	1941	
All construction	\$1,282,578,889	\$1,761,999,788	-27.2
New residential	563,655,851	898,725,698	-37.3
New nonresidential	550,814,402	641,435,539	-14.1
Additions, alterations, and repairs	168,108,636	221,838,551	-24.2

¹ Based on reports from cities with a population of 500 and over, the cities being identical for any given month of both years.

The number and permit valuation of new dwelling units for which permits were issued in the first 7 months of 1942 are compared with similar data for the corresponding months of 1941 in table 4.

TABLE 4.—*Number and Permit Valuation of New Dwelling Units, by Source of Funds and Type of Dwelling, First 7 Months of 1941 and 1942 ¹*

Source of funds and type of dwelling	Number of dwelling units			Permit valuation		
	First 7 months of—		Percent of change	First 7 months of—		Percent of change
	1942	1941		1942	1941	
All dwellings	166,919	238,723	-30.1	\$558,750,532	\$888,722,271	-37.1
Privately financed	119,152	203,880	-41.6	400,390,463	777,097,392	-48.5
1-family	85,764	155,805	-45.0	309,369,539	641,222,732	-51.8
2-family ²	10,140	12,848	-21.1	26,655,991	33,113,032	-19.5
Multifamily ³	23,248	35,227	-34.0	64,364,933	102,761,628	-37.4
Publicly financed	47,767	34,843	+37.1	158,360,069	111,624,879	+41.9

¹ Based on reports from cities with a population of 500 and over, the cities being identical for any given month of both years.² Includes 1- and 2-family dwellings with stores.³ Includes multifamily dwellings with stores.

Construction From Public Funds, July 1942

The value of contracts awarded and force-account work started during June and July 1942 and July 1941 on all construction projects financed wholly or partially from Federal funds is shown in table 5. This table includes other types of construction as well as building construction, both inside and outside 2,409 reporting cities.

TABLE 5.—Value of Contracts Awarded and Force-Account Work Started on Construction Projects Financed from Federal Funds, June and July 1942 and July 1941

Federal agency	Contracts awarded and force-account work started		
	July 1942 ¹	June 1942 ²	July 1941 ²
Total.....	\$347, 639, 223	\$1, 870, 657, 277	\$558, 575, 518
War Public Works.....	0	394, 275	(³)
Federal agency projects under the WPA.....	0	0	219, 000
Regular Federal appropriations ⁴	337, 308, 668	1, 799, 840, 648	535, 816, 410
Federal Public Housing Authority ⁵	10, 330, 555	70, 422, 354	* 22, 540, 108

¹ Preliminary; subject to revision.

² Revised.

³ Program not started until October 1941.

⁴ Exclusive of contracts awarded for public housing.

⁵ Includes contracts awarded for all public housing projects.

* Includes \$4,391,287 for contracts awarded on USHA projects and \$18,148,821 for contracts awarded from regular Federal appropriations.

The value of all contracts awarded for public buildings and highway construction to be financed wholly from State funds, as reported by the State governments for June and July 1942 and July 1941, was as follows:

	Public build- ings	Highway con- struction
July 1942.....	\$648, 113	\$6, 742, 492
June 1942.....	322, 041	10, 517, 685
July 1941.....	2, 402, 345	16, 834, 176

Retail Prices

FOOD PRICES IN JULY 1942

RETAIL costs of food advanced 1.1 percent in 51 cities combined between June 16 and July 14. Of the 54 foods included in the Bureau's index, 32 showed increases in price, 13 decreased, and 11 remained unchanged. The index of food costs for July 14 was 24.6 percent above the 1935-39 average, 5 percent above the March 17 level, and 17 percent higher than a year ago. The percent of increase in food costs for the average worker's family was slightly less than the rise from mid-May to mid-June, which was 1.3 percent.

Price of foods not under the General Maximum Price Regulation continued to advance, rising 2.5 percent during the month. Controlled food prices also rose an average of 0.3 percent. This was caused by increases in the prices of meats, milk, and beverages.

The rise in the index between June 16 and July 14 was due largely to increases for eggs, fresh fruits and vegetables, and meats. Spinach advanced 27.0 percent, sweetpotatoes 23.7 percent, lettuce 20.2 percent, eggs 8.7 percent and fresh fish 2.7 percent.

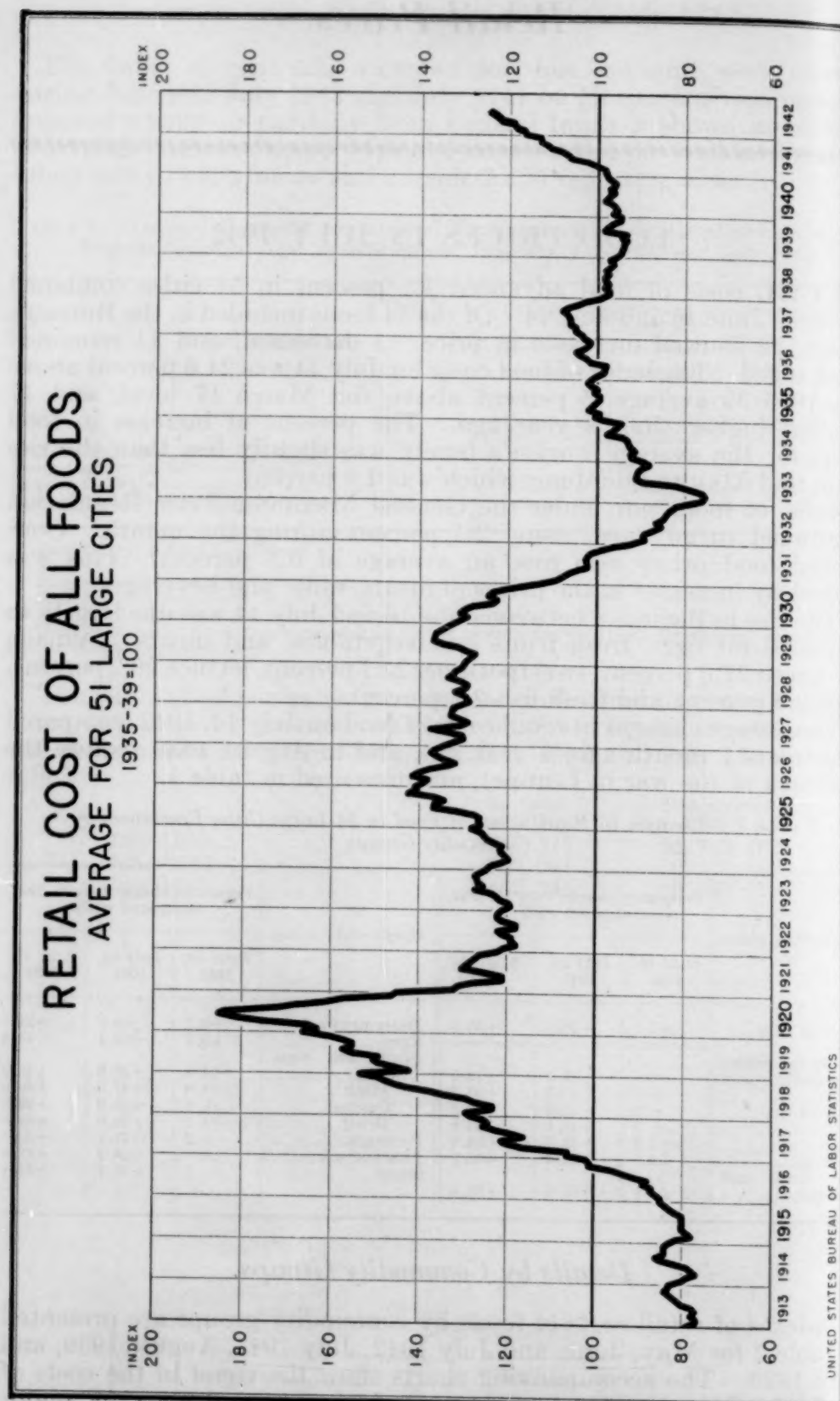
Percentage changes in retail costs of food on July 14, 1942, compared with costs 1 month ago, 1 year ago, and in August 1939 (before the outbreak of the war in Europe), are presented in table 1.

TABLE 1.—Changes in Retail Costs of Food in 51 Large Cities Combined, by Commodity Groups

Commodity group	Percent of change July 14, 1942, compared with—			Commodity group	Percent of change July 14, 1942, compared with—		
	June 16, 1942	July 15, 1941	Aug. 15, 1939		June 16, 1942	July 15, 1941	Aug. 15, 1939
All foods.....	+1.1	+16.8	+33.3	Dairy products.....	+0.7	+9.5	+32.1
Cereals and bakery products.....	0	+9.3	+12.5	Eggs.....	+8.7	+13.4	+43.4
Meats.....	+7	+17.3	+33.2	Fruits and vegetables.....	+1.4	+26.8	+46.9
Beef and veal.....	+2	+13.8	+24.1	Fresh.....	+1.8	+27.3	+49.9
Pork.....	+2	+15.1	+38.8	Canned.....	+2	+25.0	+33.6
Lamb.....	+1.8	+19.3	+34.6	Dried.....	+1.2	+26.0	+48.6
Chickens.....	+1.9	+20.3	+32.9	Beverages.....	+2	+21.1	+29.4
Fish, fresh and canned.....	+1.8	+33.9	+61.8	Fats and oils.....	0	+24.2	+42.0
				Sugar.....	-.1	+17.4	+32.4

Details by Commodity Groups

Indexes of retail costs of foods by commodity groups are presented in table 2 for May, June, and July 1942, July 1941, August 1939, and July 1929. The accompanying charts show the trend in the costs of all foods, January 1913 to July 1942, inclusive, and for each major commodity group for the period January 1929 to July 1942, inclusive.



Cere
practi
ported
Wheat
increa
soda c
Meat
red sa
roastin
for the
6 repo

TABLE

All foods
Cereals
Meats
Beef
Pork
Lamb
Chicken
Fish
Dairy products
Eggs
Fruits and vegetables
Fruit
Canned
Dried
Beverages
Fats and oils
Sugar

¹ Aggreg
and low
² Prel
³ Not
⁴ Rev

De
advan
incre
advan
York
cheese
Eggs
the a
were
occu
Fr
lettuce
for p
for t
show
lettuce
(9.6
cann
were

Cereals and bakery products.—Retail prices of white bread were practically unchanged during the month, with a slight increase reported for Dallas and minor decreases for Cleveland and St. Paul. Wheat flour, whole-wheat bread, and macaroni declined slightly while increases were reported for rolled oats, corn meal, vanilla cookies, and soda crackers.

Meats.—Advances were reported for all meats except whole ham and red salmon. All increases were slight except for fresh fish (2.7 percent), roasting chickens (1.9 percent), and lamb (1.8 percent). Increases for the meats group were reported for 39 cities, 6 showed no change, and 6 reported decreases. Few cities showed changes as great as 1 percent.

TABLE 2.—*Indexes of Retail Costs of Food in 51 Large Cities Combined¹ by Commodity Groups, in Specified Months*

[1935-39=100]

Commodity group	1942			1941	1939	1929
	July 14 ²	June 16	May 12	July 15	August 15	July 15
All foods.....	124.6	123.2	121.6	106.7	93.5	134.9
Cereals and bakery products.....	105.1	105.1	105.2	96.2	93.4	107.3
Meats.....	127.5	126.6	124.3	108.7	95.7	132.1
Beef and veal.....	123.6	123.3	124.1	108.6	99.6	(³)
Pork.....	122.1	121.9	123.2	106.1	88.0	(³)
Lamb.....	133.0	⁴ 130.7	118.2	111.5	98.8	(³)
Chickens.....	125.7	123.3	113.4	104.5	94.6	(³)
Fish, fresh and canned.....	161.2	158.3	150.9	120.4	99.6	(³)
Dairy products.....	123.0	122.1	123.3	112.3	93.1	129.3
Eggs.....	130.1	119.7	115.4	114.7	90.7	129.8
Fruits and vegetables.....	135.7	⁴ 133.8	128.7	107.0	92.4	184.1
Fresh.....	139.1	⁴ 136.7	130.0	109.3	92.8	191.6
Canned.....	122.4	⁴ 122.2	122.7	97.9	91.6	126.5
Dried.....	134.2	⁴ 132.6	131.2	106.5	90.3	170.5
Beverages.....	122.8	122.6	124.6	101.4	94.9	165.7
Fats and oils.....	120.0	120.0	122.4	96.6	84.5	127.3
Sugar.....	126.6	126.7	127.1	107.8	95.6	111.4

¹ Aggregate costs of 54 foods in each city, weighted to represent total purchases of families of wage earners and lower-salaried workers, have been combined with the use of population weights.

² Preliminary.

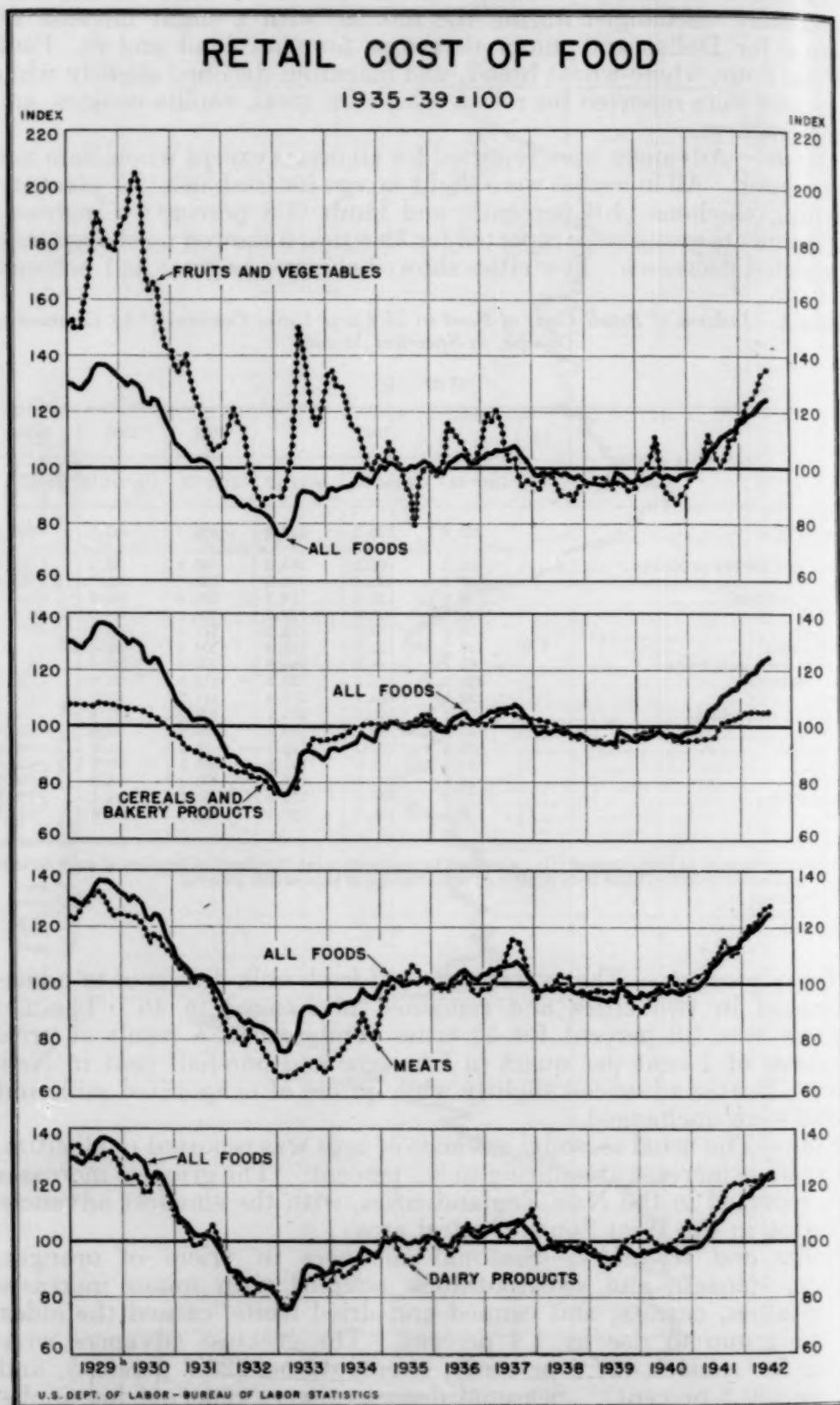
³ Not available.

⁴ Revised.

Dairy products.—The average price of fresh milk delivered to homes advanced in two cities and remained unchanged in 49. The net increase was 1.3 percent for 51 cities combined as a result of price advances of 1 cent per quart in Chicago, and one-half cent in New York. Butter advanced slightly while prices of evaporated milk and cheese were unchanged.

Eggs.—The usual seasonal advance of eggs was reported in all cities, the average increase amounting to 8.7 percent. The greatest increases were reported in the New England cities, with the smallest advances occurring in the West South Central area.

Fruits and vegetables.—Seasonal advances in prices of oranges, lettuce, spinach, and sweetpotatoes, coupled with minor increases for potatoes, carrots, and canned and dried fruits, caused the index for the group to rise by 1.4 percent. The greatest advances were shown for spinach (27.0 percent), sweetpotatoes (23.7 percent), and lettuce (20.2 percent). Seasonal decreases were reported for apples (9.6 percent) and cabbage (11.5 percent). Bananas, onions, and canned vegetables also declined. Increases for the groups as a whole were reported for 31 cities while 20 cities showed declines.



Beverages.—Prices of coffee and tea rose 7 percent and 1.4 percent, respectively, causing the group to advance 0.2 percent; 25 cities shared in the advance.

Fats and oils.—The index for the group remained unchanged, with only slight fluctuations in the prices of peanut butter, margarine, and shortening.

Sugar.—Sugar prices were relatively stable, declining only 0.1 percent. Increases were reported for 11 cities, decreases for 24, and 16 remained unchanged.

Average prices of 65 foods in 51 cities combined are shown in table 3 for June and July 1942 and July 1941.

TABLE 3.—Average Retail Prices of 65 Foods in 51 Large Cities Combined, June and July 1942 and July 1941

Article	1942		1941
	July 14 ¹	June 16	July 15
Cereals and bakery products:			
<i>Cereals:</i>			
Flour, wheat.....10 pounds	<i>Cents</i> 50.9	<i>Cents</i> 51.2	<i>Cents</i> 46.1
Macaroni.....pound	14.1	14.2	13.8
Wheat cereal ².....28-oz. pkg	24.1	24.1	23.5
Corn flakes.....8 ounces	7.2	7.2	7.0
Corn meal.....pound	4.8	4.7	4.3
Rice ³.....do	12.2	12.2	8.8
Rolled oats ².....do	8.7	8.6	7.1
<i>Bakery products:</i>			
Bread, white.....do	8.7	8.7	7.9
Bread, whole-wheat.....do	9.5	9.6	8.8
Bread, rye.....do	9.7	9.7	9.0
Vanilla cookies.....do	27.9	27.8	25.8
Soda crackers.....do	16.5	16.4	15.1
Meats:			
<i>Beef:</i>			
Round steak.....do	43.6	43.4	38.8
Rib roast.....do	33.9	33.8	30.3
Chuck roast.....do	29.2	29.1	24.6
<i>Veal:</i>			
Cutlets.....do	54.1	53.8	46.6
<i>Pork:</i>			
Chops.....do	42.4	42.3	37.0
Bacon, sliced.....do	39.2	39.1	35.4
Ham, sliced ².....do	59.0	58.9	51.4
Ham, whole.....do	37.7	37.7	32.3
Salt pork.....do	23.9	23.7	19.7
<i>Lamb:</i>			
Leg.....do	37.4	37.0	30.2
Rib chops.....do	47.3	³ 46.1	40.8
<i>Poultry:</i>			
Roasting chickens.....do	39.8	39.3	33.5
<i>Fish:</i>			
Fresh, frozen.....do	⁽⁴⁾	⁽⁴⁾	⁽⁴⁾
Salmon, pink.....16-oz. can	21.7	21.6	17.6
Salmon, red ².....do	40.1	40.1	28.8
Dairy products:			
Butter.....pound	44.7	44.5	43.0
Cheese.....do	33.9	33.9	30.1
Milk, fresh (delivered).....quart	15.1	14.9	13.4
Milk, fresh (store).....do	13.5	13.5	12.3
Milk, fresh (delivered and store) ².....do	14.5	14.4	13.0
Milk, evaporated.....14½-oz. can	8.7	8.7	7.8
Eggs.....dozen	46.1	42.4	40.6
Fruits and vegetables:			
<i>Fresh:</i>			
Apples.....pound	8.5	9.4	5.8
Bananas.....do	10.4	10.5	7.1
Oranges.....dozen	36.5	36.2	29.5
Grapefruit ².....each	7.6	7.5	⁽⁵⁾
Beans, green.....pound	10.4	10.2	9.7
Cabbage.....do	4.6	5.2	4.1
Carrots.....bunch	7.0	6.9	5.3
Lettuce.....head	12.5	10.4	10.0

See footnotes at end of table.

TABLE 3.—Average Retail Prices of 65 Foods in 51 Large Cities Combined, June and July 1942 and July 1941—Continued

Article	1942		1941
	July 14 ¹	June 16	July 15
Fruits and vegetables—Continued.			
Fresh—Continued.			
Onions.....pound.....	Cents 4.9	Cents 5.0	Cents 4.8
Potatoes.....15 pounds.....	58.9	² 57.9	41.4
Spinach.....pound.....	9.4	7.4	7.9
Sweetpotatoes.....do.....	7.3	5.9	6.2
Canned:			
Peaches.....No. 2½ can.....	23.5	23.3	18.1
Pineapple.....do.....	27.3	27.0	21.3
Grapefruit juice ².....No. 2 can.....	10.8	³ 10.2	(⁴)
Beans, green ².....do.....	13.9	³ 13.9	10.8
Corn.....do.....	12.8	13.0	11.0
Peas.....do.....	15.5	15.7	13.0
Tomatoes.....do.....	11.9	12.0	9.2
Dried:			
Prunes.....pound.....	12.7	³ 12.5	9.7
Navy beans.....do.....	8.9	8.9	7.3
Beverages and chocolate:			
Coffee.....do.....	28.6	28.4	23.7
Tea.....¼ pound.....	22.4	22.1	18.2
Cocoa ².....8-oz. can.....	10.0	(⁵)	9.1
Fats and oils:			
Lard.....pound.....	17.0	17.0	13.7
Shortening, other than lard:			
In cartons.....do.....	19.6	19.5	15.3
In other containers.....do.....	25.3	25.6	20.4
Salad dressing.....pint.....	25.2	25.2	21.8
Oleomargarine.....pound.....	22.3	22.4	16.8
Peanut butter.....do.....	26.0	26.0	18.0
Sugar and sweets:			
Sugar.....do.....	6.8	6.8	5.8
Corn sirup ².....24 ounces.....	14.8	² 14.7	13.9
Molasses ².....13 ounces.....	14.7	³ 14.7	13.4

¹ Preliminary.² Not included in index.³ Revised.⁴ Composite prices not computed.⁵ Priced first time on Oct. 14, 1941.⁶ Not available.

Details by Cities

Retail food costs advanced in 39 cities, receded in 11, and remained unchanged in one (Milwaukee). The largest increases were reported for New Orleans (3.2 percent), Jacksonville and Los Angeles (2.9 percent), Dallas (2.8 percent), Philadelphia (2.7 percent) and Houston (2.6 percent). In these cities, greater-than-average advances for eggs and fruits and vegetables largely accounted for the increases in food costs. The largest decrease was reported for Columbus, Ohio (1.6 percent), where all groups showed decreases or no changes except meats and eggs. Food costs in all cities included in the survey are more than 13 percent above a year ago.

Indexes of food costs by cities are presented in table 4 for June and July 1942 and July 1941.

TABLE 4.—*Indexes of the Average Retail Cost of All Foods, by Cities,¹ June and July 1942 and July 1941*

[1935-39=100]

Region and city	1942		1941	Region and city	1942		1941
	July 14 ²	June 16	July 15		July 14 ²	June 16	July 15
United States.....	124.6	123.2	106.7	South Atlantic:			
New England:				Atlanta.....	122.7	121.8	105.2
Boston.....	122.6	119.9	104.7	Baltimore.....	128.3	127.1	108.6
Bridgeport.....	124.9	124.0	107.6	Charleston, S. C.....	125.0	122.9	107.6
Fall River.....	124.8	122.6	107.5	Jacksonville.....	135.1	129.3	111.4
Manchester.....	126.2	125.3	107.1	Norfolk ³	129.8	128.5	108.4
New Haven.....	124.2	120.6	105.9	Richmond.....	123.6	122.9	105.1
Portland, Maine.....	124.4	122.9	106.3	Savannah.....	132.0	129.4	113.5
Providence.....	125.4	122.8	107.0	Washington, D. C.....	125.3	123.2	105.7
Middle Atlantic:				East South Central:			
Buffalo.....	127.8	127.3	110.8	Birmingham.....	121.2	120.9	105.2
Newark.....	125.1	122.3	106.1	Louisville.....	122.4	123.2	107.9
New York.....	122.8	120.4	107.0	Memphis.....	125.5	124.1	105.7
Philadelphia.....	122.9	119.7	103.3	Mobile.....	129.8	128.4	110.4
Pittsburgh.....	124.1	124.7	108.7	West South Central:			
Rochester.....	125.1	126.2	109.7	Dallas.....	120.9	117.6	100.9
Scranton.....	125.3	123.0	106.8	Houston.....	128.2	124.9	108.7
East North Central:				Little Rock.....	124.7	123.3	104.9
Chicago.....	123.1	122.1	107.5	New Orleans.....	133.0	128.9	112.0
Cincinnati.....	124.2	124.3	104.8	Mountain:			
Cleveland.....	126.7	127.4	108.7	Butte.....	122.7	123.5	106.8
Columbus, Ohio.....	118.4	120.3	104.5	Denver.....	124.4	123.7	104.2
Detroit.....	125.0	124.5	107.2	Salt Lake City.....	129.2	126.8	106.7
Indianapolis.....	125.5	125.7	106.9	Pacific:			
Milwaukee.....	122.0	122.0	106.8	Los Angeles.....	133.6	129.8	107.2
Peoria.....	130.0	129.6	110.2	Portland, Oreg.....	135.6	134.6	111.5
Springfield, Ill.....	129.0	128.4	106.7	San Francisco.....	126.6	126.1	107.2
West North Central:				Seattle.....	130.9	129.4	109.3
Kansas City.....	118.3	119.0	101.2				
Minneapolis.....	122.1	121.4	108.2				
Omaha.....	119.8	120.8	103.4				
St. Louis.....	126.0	125.9	108.5				
St. Paul.....	118.9	119.2	103.9				

¹ Aggregate costs of 54 foods in each city, weighted to represent total purchases of families of wage earners and lower-salaried workers, have been combined for the United States with the use of population weights. Primary use is for time-to-time comparisons rather than place-to-place comparisons.

² Preliminary.³ Includes Portsmouth and Newport News.⁴ Revised.

Average Annual Indexes of Retail Food Costs, 1913 to 1941

Annual average indexes of food costs for the years 1913 to 1941, inclusive, and monthly indexes for January 1941 to July 1942, inclusive, are shown in table 5.

TABLE 5.—*Indexes of Retail Food Costs in 51 Large Cities Combined, by Years, From 1913 to 1941, and by Months, January 1941 to July 1942*

[1935-39=100]

Year	All-foods index	Year	All-foods index	Year and month	All-foods index	Year and month	All-foods index
1913.....	79.9	1927.....	132.3	1941.....	105.5	1941—Con.	
1914.....	81.8	1928.....	130.8			November.....	113.1
1915.....	80.9	1929.....	132.5	1941		December.....	113.1
1916.....	90.8	1930.....	126.0	January.....	97.8		
1917.....	116.9	1931.....	103.9	February.....	97.9	1942	
1918.....	134.4	1932.....	86.5	March.....	98.4	January.....	116.2
1919.....	149.8	1933.....	84.1	April.....	100.6	February.....	116.8
1920.....	168.8	1934.....	93.7	May.....	102.1	March.....	118.6
1921.....	128.3	1935.....	100.4	June.....	105.9	April.....	119.6
1922.....	119.9	1936.....	101.3	July.....	106.7	May.....	121.6
1923.....	124.0	1937.....	105.3	August.....	108.0	June.....	123.2
1924.....	122.8	1938.....	97.8	September.....	110.7	July.....	124.6
1925.....	132.9	1939.....	95.2	October.....	111.6		
1926.....	137.4	1940.....	96.6				

COAL PRICES IN JUNE 1942

RETAIL prices of bituminous coal and Pennsylvania anthracite declined slightly during the 3-month period from March 15 to June 15, 1942. Arkansas and Colorado anthracites increased by small amounts and New Mexico anthracite was unchanged in price. Coal prices were affected during this period by price regulations, seasonal discounts, and adjustments for higher freight rates.

Average prices of all kinds of coal were higher in June 1942 than in June 1941. An advance of 6.7 percent for bituminous coal during the year brought the price level above that of any June since 1923. Stove and chestnut sizes of Pennsylvania anthracite increased about 7.8 percent and were higher than in any June since 1931. In June 1942 prices of pea and buckwheat sizes of Pennsylvania anthracite were higher than in June of any year since 1937 when prices for these sizes were first published by the Bureau. Arkansas anthracite prices moved up about 5 percent during the year and Colorado and New Mexico anthracite prices also increased slightly. The increase for Colorado anthracite between March and June was the first price change reported since 1935.

Average prices of coal, together with indexes for bituminous coal and for stove and chestnut sizes of Pennsylvania anthracite are presented in table 6 for June and March 1942 and June 1941.

TABLE 6.—Average Retail Prices of Coal in Large Cities Combined, June and March 1942 and June 1941

Kind of coal	Average retail price per ton of 2,000 pounds			Index of retail price (October 1922-September 1925=100)			Percentage change, June 15, 1942, compared with	
	1942		1941	1942		1941	1942	1941
	June 15 ¹	Mar. 15	June 15	June 15 ¹	Mar. 15	June 15	Mar. 15	June 15
Bituminous coal (35 cities), old series ²	\$9.49	\$9.52	\$8.89	96.6	96.7	90.5	-0.1	+6.7
Pennsylvania anthracite (25 cities), new series: ³								
Stove.....	12.40	12.42	11.51	88.1	88.2	81.8	-.1	+7.7
Chestnut.....	12.48	12.48	11.57	88.8	88.9	82.4	-.1	+7.8
Pea.....	10.55	10.56	9.61				-.1	+9.8
Buckwheat.....	8.57	8.64	8.40				-.8	+2.0
Western anthracite: ²								
Arkansas (6 cities).....	13.60	⁴ 13.57	⁴ 13.00				+ .2	+4.6
Colorado (1 city).....	15.85	15.81	15.81				+ .3	+ .3
New Mexico (1 city).....	24.72	24.72	23.86				0	+3.6

¹ Preliminary.

² Unweighted average. Weighted composite prices are in preparation.

³ Weighted on the basis of distribution by rail or rail and tidewater to each city during the 12-month period from Aug. 1, 1935 to July 31, 1936.

⁴ Revised.

Details by Kinds of Coal

Bituminous coal.—There were only minor adjustments in retail prices of bituminous coal between March 15 and June 15, 1942, in most of the reporting cities. Although increases in prices were more numerous than decreases, in general, the amount of the increases was relatively smaller. Where advances in prices occurred, they usually

affected only one of several domestic sizes sold in a city. In cities where decreases were reported, on the other hand, they were generally effective on most of the sizes sold. Prices of low-volatile coal decreased 45 cents per ton in Fall River and 30 cents in Boston during the 3-month period. In Detroit the decreases ranged from 14 to 24 cents per ton. The greatest reductions for eastern high-volatile coals were reported in Mobile, about 50 cents per ton for all sizes except stoker (which advanced slightly); and in Atlanta where the decreases were from 14 to 23 cents per ton. Decreases for western high-volatile coals were largest in Houston, 25 cents per ton; and in St. Louis where lump, egg, and stove prices were down 14 cents.

Retail prices of bituminous coal in June 1942 were higher than a year ago in practically all reporting cities. Advances in a majority of the cities ranged from 30 to 80 cents for low-volatile and eastern high-volatile coals and from 20 to 60 cents for western high-volatile coals. The greatest increases during the year occurred in cities where the total amount of bituminous coal used is relatively small because of the size of the city, climatic conditions, or the use of other fuels. The greatest advances in prices during the year for low-volatile coal were reported in Fall River, an average of \$1.30 per ton, and in Richmond, where increases ranging from 75 cents for run of mine to \$1.25 for stove and egg were shown. Eastern high-volatile coal increased about \$1.45 in Atlanta, \$1.02 to \$1.17 in Mobile, and \$1.02 in New Orleans. Western high-volatile prices were \$1 higher than in June 1941 in Houston and San Francisco.

Anthracite.—Retail prices of Pennsylvania anthracite for June 15, 1942, showed no change from March 15 in about one quarter of the reporting cities, and few of the changes in the remaining cities amounted to more than 5 cents per ton. The greatest increase was in Bridgeport, 17 cents for stove and chestnut; and the largest decrease was in New York City, 9 cents per ton for buckwheat.

Price advances between June 1941 and June 1942 were more than 40 cents per ton for stove, chestnut, and pea in all cities where these are important domestic coals. Increases of \$1 or more occurred in a third of the cities reporting on these sizes, with the greatest advance, \$1.30 per ton, in Fall River. Changes for the year in prices of buckwheat were relatively small except in three cities where increases of as much as \$1 were reported.

Arkansas anthracite prices increased 5 cents per ton in three cities, showed no change in two, and decreased 25 cents in Houston. Prices of Colorado anthracite, reported in Denver only, advanced 4 cents per ton between March and June. New Mexico anthracite prices, reported in San Francisco, remained unchanged during the 3-month period. All of these western anthracite prices were higher than in June 1941.

Wholesale Prices

WHOLESALE PRICES IN JULY 1942 ¹

AVERAGE prices for commodities in primary markets ² moved fractionally higher in July as a result of advancing prices for certain agricultural commodities and for petroleum products. The Bureau of Labor Statistics index of prices for 889 series rose 0.1 percent, to 98.7 percent of the 1926 level, and partially offset the recession in June. In the past 12 months average prices for these commodities have advanced 11 percent and are more than 31 percent higher than at the outbreak of the war in Europe in August 1939.

Except for advances of 0.9 percent in the farm products group and 0.8 percent for fuel and lighting materials, changes in the commodity group indexes were relatively slight. Building materials advanced 0.2 percent because of higher prices for lath and certain types of western lumber. Lower prices for men's suits, and action by the Office of Price Administration in rolling back ceiling prices on industrial grades of fats and vegetable oils, largely accounted for declines of 0.5 percent in the textile products and chemicals and allied products groups. Weakening prices for cattle feed and paper and pulp caused the miscellaneous commodities group index to drop 0.4 percent. Foods, metals and metal products, and housefurnishing goods declined 0.1 percent, while hides and leather products remained unchanged from the June level.

Most commodity markets showed substantial gains over the August 1939 level. Some of the outstanding increases were over 156 percent for industrial fats and oils, 99 percent for cattle feed, 78 percent for livestock and poultry, 73 percent for grains, 72 percent for cotton goods, 68 percent for fruits and vegetables, and 67 percent for drugs and pharmaceuticals. During the past 3 years meats, hides and skins, and "other textile products," including burlap, hemp, jute and sisal, advanced over 50 percent; dairy products, woolen and worsted goods, and lumber, more than 40 percent; and cereal products, shoes, leather clothing, motor vehicles, paint and paint materials, housefurnishings, furniture, automobile tires and tubes, paper and pulp, and crude rubber, between 20 and 40 percent. Since August 1939 average prices for raw materials advanced 50 percent, while semi-manufactured and fully manufactured products rose approximately 25 percent.

Although the rate of increase in the upward price movement slackened considerably during the past year under the influence of controls

¹ During the period of rapid changes caused by price controls, materials allocation, and rationing, the Bureau of Labor Statistics will attempt promptly to report changing prices. Indexes marked (*), however, must be considered as preliminary and subject to such adjustment and revision as required by later and more complete reports.

² The Bureau of Labor Statistics wholesale price data for the most part represent prices prevailing in the "first commercial transaction." They are prices quoted in primary markets, at principal distribution points.

exerted by the Office of Price Administration, there were substantial increases in markets which are not regulated. For instance, during the year period, farm product prices increased nearly 23 percent; and foods (about 40 percent of the aggregate value uncontrolled), 17 percent. From July 1941 to July 1942 chemicals and allied products advanced 13 percent; and textile products, 12 percent. The hides and leather products, fuel and lighting materials, housefurnishing goods, and miscellaneous commodities group indexes are less than 10 percent higher than they were at this time last year.

In July farm products prices rose to the highest point since the autumn of 1929. Quotations were higher for wheat and corn, for calves, steers, hogs, and live poultry, and for cotton, eggs, citrus fruits, hops, fresh milk in the New York and Chicago markets, dried beans, onions, and sweetpotatoes. Lower prices were reported for barley, oats, rye, cows, sheep, fresh milk at San Francisco, fresh apples, seeds, hay, tobacco, and white potatoes.

Average prices for foods in primary markets declined slightly as a result of seasonally lower prices for fresh fruits and vegetables, together with declines for fresh beef, lamb, mutton, fresh pork, dressed poultry, and for canned salmon, glucose, peanut butter, pepper, and olive oil. Higher prices were reported for butter, cheese, flour, corn meal, canned and dried fruits and vegetables, bacon, veal, and for codfish, lard, oleo oil, tallow, cottonseed oil, and corn oil.

Industrial commodity markets remained fairly steady during July. Prices were lower for cotton materials such as shirting and sateen, also for men's suits and some types of women's cotton hosiery. Advancing prices were reported for bituminous coal in certain areas, and for gasoline and kerosene.

Lower prices for plumbing and heating equipment and for quicksilver accounted for a decline of 0.1 percent in the metals and metal products group index.

Higher prices for rosin, lath, and some types of western lumber caused average prices for building materials to advance 0.2 percent. Prices were lower for maple flooring, for Ponderosa pine boards, for common building brick, and for tung oil, linseed oil, and turpentine.

The index for industrial fats and oils dropped 4 percent as a result of the action of the Office of Price Administration in rolling back prices about 1 cent a pound.

In the miscellaneous group of commodities, lower prices were reported for cattle feed, 2.6 percent; paper and pulp, 1.1 percent; and soap, 0.7 percent.

Percentage comparisons of the July 1942 level of wholesale prices with June 1942, July 1941, and August 1939, with corresponding index numbers are given in table 1.

TABLE 1.—Index Numbers of Wholesale Prices by Groups and Subgroups of Commodities, July 1942 With Comparisons for June 1942, July 1941, and August 1939

[1926=100]

Group and subgroup	July 1942	June 1942	Percent of change	July 1941	Percent of change	August 1939	Percent of change
All commodities	*98.7	*98.6	+0.1	88.8	+11.1	75.0	+31.6
Farm Products	105.3	104.4	+ .9	85.8	+22.7	61.0	+72.6
Grains	89.1	88.8	+ .3	76.3	+16.8	51.5	+73.0
Livestock and poultry	117.8	116.9	+ .8	98.9	+19.1	66.0	+78.5
Other farm products	101.5	100.5	+1.0	79.9	+27.0	60.1	+68.9
Foods	99.2	99.3	— .1	84.7	+17.1	67.2	+47.6
Dairy products	96.0	92.0	+4.3	87.7	+9.5	67.9	+41.4
Cereal products	87.2	87.2	0	80.3	+8.6	71.9	+21.3
Fruits and vegetables	98.5	105.4	—6.5	69.4	+41.9	58.5	+68.4
Meats	113.4	113.9	— .4	93.8	+20.9	73.7	+53.9
Other foods	91.9	91.0	+1.0	81.6	+12.6	60.3	+52.4
Hides and leather products	118.2	118.2	0	109.4	+8.0	92.7	+27.5
Shoes	126.4	126.4	0	114.7	+10.2	100.8	+25.4
Hides and skins	118.5	118.5	0	112.5	+5.3	77.2	+53.5
Leather	101.3	101.3	0	98.1	+3.3	84.0	+20.6
Other leather products	115.2	115.2	0	102.7	+12.2	97.1	+18.6
Textile products	97.1	97.6	— .5	86.2	+12.6	67.8	+43.2
Clothing	107.2	109.1	—1.7	93.9	+14.2	81.5	+31.5
Cotton goods	112.7	112.7	0	96.1	+17.3	65.5	+72.1
Hosiery and underwear	69.7	70.0	— .4	62.9	+10.8	61.5	+13.3
Rayon	30.3	30.3	0	29.5	+2.7	28.5	+6.3
Silk	(1)	(1)	—	51.4	—	44.3	—
Woolen and worsted goods	111.0	111.0	0	96.5	+15.0	75.5	+47.0
Other textile products	98.2	98.2	0	98.0	+ .2	63.7	+54.2
Fuel and lighting materials	79.0	78.4	+ .8	78.5	+ .6	72.6	+8.8
Anthracite	85.7	85.7	0	82.2	+4.3	72.1	+18.9
Bituminous coal	109.8	109.2	+ .5	104.9	+4.7	96.0	+14.4
Coke	122.1	122.1	0	122.2	— .1	104.2	+17.2
Electricity	(1)	(1)	—	66.8	—	75.8	—
Gas	(1)	81.2	—	80.8	—	86.7	—
Petroleum and products	60.6	59.8	+1.3	60.9	— .5	51.7	+17.2
Metals and metal products	*103.8	*103.9	— .1	98.5	+5.4	93.2	+11.4
Agricultural implements	96.9	96.9	0	92.5	+4.8	93.5	+3.6
Farm machinery	98.0	98.0	0	93.5	+4.8	94.7	+3.5
Iron and steel	97.2	97.2	0	96.8	+ .4	95.1	+2.2
Motor vehicles	*112.8	*112.8	0	100.4	+12.4	92.5	+21.9
Nonferrous metals	85.6	85.6	0	84.7	+1.1	74.6	+14.7
Plumbing and heating	94.1	98.5	—4.5	83.2	+13.1	79.3	+18.7
Building materials	110.3	110.1	+ .2	103.1	+7.0	89.6	+23.1
Brick and tile	98.0	98.1	— .1	94.2	+4.0	90.5	+8.3
Cement	94.2	94.2	0	92.1	+2.3	91.3	+3.2
Lumber	132.9	131.7	+ .9	122.3	+8.7	90.1	+47.5
Paint and paint materials	100.7	100.3	+ .4	91.6	+9.9	82.1	+22.7
Plumbing and heating	94.1	98.5	—4.5	83.2	+13.1	79.3	+18.7
Structural steel	107.3	107.3	0	107.3	0	107.3	0
Other building materials	103.8	103.8	0	98.4	+5.5	89.5	+16.0
Chemicals and allied products	96.7	97.2	— .5	85.2	+13.5	74.2	+30.3
Chemicals	96.5	96.5	0	87.3	+10.5	83.8	+15.2
Drugs and pharmaceuticals	129.1	129.1	0	100.0	+29.1	77.1	+67.4
Fertilizer materials	78.5	78.4	+ .1	74.0	+6.1	65.5	+19.8
Mixed fertilizers	82.8	82.8	0	77.0	+7.5	73.1	+13.3
Oils and fats	104.2	108.5	—4.0	83.7	+24.5	40.6	+156.7
Housefurnishing goods	102.8	102.9	— .1	94.4	+8.9	85.6	+20.1
Furnishings	108.0	108.1	— .1	99.7	+8.3	90.0	+20.0
Furniture	97.5	97.4	+ .1	88.9	+9.7	81.1	+20.2
Miscellaneous	89.8	90.2	— .4	82.0	+9.5	73.3	+22.5
Automobile tires and tubes	73.0	73.0	0	58.8	+24.1	60.5	+20.7
Cattle feed	136.3	140.0	—2.6	104.2	+30.8	68.4	+99.3
Paper and pulp	100.5	101.6	—1.1	98.8	+1.7	80.0	+25.6
Rubber, crude	46.3	46.3	0	46.0	+ .7	34.9	+32.7
Other miscellaneous	93.3	93.3	0	88.9	+4.9	81.3	+14.8
Raw materials	100.1	99.8	+ .3	86.1	+16.3	66.5	+50.5
Semimanufactured articles	92.8	92.8	0	87.9	+5.6	74.5	+24.6
Manufactured products	*98.6	*98.6	0	90.1	+9.4	79.1	+24.7
All commodities other than farm products	*97.0	*97.1	— .1	89.3	+8.6	77.9	+24.5
All commodities other than farm products and foods	*95.7	*95.6	+ .1	89.7	+6.7	80.1	+19.5

*Preliminary.

1 Data not yet available.

Index Numbers by Commodity Groups, 1926 to July 1942

Index numbers of wholesale prices by commodity groups for selected years from 1926 to 1941, and by months from July 1941 to July 1942, inclusive, are shown in table 2.

TABLE 2.—Index Numbers of Wholesale Prices by Groups of Commodities

[1926=100]

Year and month	Farm products	Foods	Hides and leather products	Textile products	Fuel and lighting	Metals and metal products	Building materials	Chemicals and allied products	House-furnishing goods	Miscellaneous	All commodities
1926.....	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
1929.....	104.9	99.9	109.1	90.4	83.0	100.5	95.4	94.0	94.3	82.6	95.3
1932.....	48.2	61.0	72.9	54.9	70.3	80.2	71.4	73.9	75.1	64.4	64.8
1933.....	51.4	60.5	80.9	64.8	66.3	79.8	77.0	72.1	75.8	62.5	65.9
1937.....	86.4	85.5	104.6	76.3	77.6	95.7	95.2	82.6	89.7	77.8	86.3
1938.....	68.5	73.6	92.8	66.7	76.5	95.7	90.3	77.0	86.8	73.3	78.6
1939.....	65.3	70.4	95.6	69.7	73.1	94.4	90.5	76.0	86.3	74.8	77.1
1940.....	67.7	71.3	100.8	73.8	71.7	95.8	94.3	77.0	88.5	77.3	78.6
1941.....	82.4	82.7	108.3	84.8	76.2	99.4	103.2	84.6	94.3	82.0	87.3
<i>1941</i>											
July.....	85.8	84.7	109.4	86.2	78.5	98.5	103.1	85.2	94.4	82.0	88.8
August.....	87.4	87.2	110.2	88.3	79.0	98.6	105.5	86.0	95.4	83.7	90.3
September.....	91.0	89.5	111.3	89.7	79.2	98.6	106.4	87.4	97.2	85.1	91.8
October.....	90.0	88.9	112.6	90.9	79.6	103.1	107.3	89.7	99.5	86.4	92.4
November.....	90.6	89.3	114.1	91.1	78.8	103.3	107.5	89.8	100.6	87.3	92.5
December.....	94.7	90.5	114.8	91.8	78.4	103.3	107.8	91.3	101.1	87.6	93.6
<i>1942</i>											
January.....	100.8	93.7	114.9	93.6	78.2	103.5	109.3	96.0	102.4	89.3	96.0
February.....	101.3	94.6	115.3	95.2	78.0	103.6	110.1	97.0	102.5	89.3	96.7
March.....	102.8	96.1	116.7	96.6	77.7	103.8	110.5	97.1	102.6	89.7	97.6
April.....	104.5	98.7	119.2	97.7	77.7	103.8	110.2	97.1	102.8	90.3	98.7
May.....	104.4	98.9	118.8	98.0	78.0	103.9	110.1	97.3	102.9	90.5	98.8
June.....	104.4	99.3	118.2	97.6	78.4	¹ 103.9	110.1	97.2	102.9	90.2	¹ 98.6
July.....	105.3	99.2	118.2	97.1	79.0	¹ 103.8	110.3	96.7	102.8	89.8	¹ 98.7

¹ Preliminary figure.

The price trend for specified years and months since 1926 is shown in table 3 for the following groups of commodities: Raw materials, semimanufactured articles, manufactured products, commodities other than farm products, and commodities other than farm products and foods. The list of commodities included under the classifications "Raw materials," "Semimanufactured articles," and "Manufactured products" was given in Serial No. R. 1434—Wholesale Prices, December and Year 1941.

TABLE 3.—Index Numbers of Wholesale Prices by Special Groups of Commodities

[1926=100]

Year and month	Raw materials	Semi-manufactured articles	Manufactured products	All commodities other than farm products	All commodities other than farm products and foods	Year and month	Raw materials	Semi-manufactured articles	Manufactured products	All commodities other than farm products	All commodities other than farm products and foods
1926.....	100.0	100.0	100.0	100.0	100.0	1941—Con.					
1929.....	97.5	93.9	94.5	93.3	91.6	October.....	89.7	89.9	93.9	92.8	93.4
1932.....	55.1	59.3	70.3	68.3	70.2	November.....	90.2	89.7	93.8	92.7	93.5
1933.....	56.5	65.4	70.5	69.0	71.2	December.....	92.3	90.1	94.6	93.3	93.7
1937.....	84.8	85.3	87.2	86.2	85.3	1942					
1938.....	72.0	75.4	82.2	80.6	81.7	January.....	96.1	91.7	96.4	94.8	94.6
1939.....	70.2	77.0	80.4	79.5	81.3	February.....	97.0	92.0	97.0	95.5	94.9
1940.....	71.9	79.1	81.6	80.8	83.0	March.....	98.2	92.3	97.8	96.2	95.2
1941.....	83.5	86.9	89.1	88.3	89.0	April.....	100.0	92.8	98.7	97.2	95.6
July.....	86.1	87.9	90.1	89.3	89.7	May.....	99.7	92.9	99.0	97.4	95.7
August.....	87.6	89.5	91.5	90.7	90.8	June.....	99.8	92.8	98.6	97.1	95.6
September.....	90.0	90.3	92.8	91.9	91.6	July.....	100.1	92.8	98.6	97.0	95.7

† † Preliminary.

Weekly Fluctuations

Weekly fluctuations in the major commodity group classifications during June and July are shown by the index numbers in table 4.

TABLE 4.—Weekly Index Numbers of Wholesale Prices by Commodity Groups, June and July 1942

[1926=100]

Commodity group	July 25	July 18	July 11	July 4	June 27	June 20	June 13	June 6
All commodities.....	1 98.4	1 98.3	1 98.5	1 98.5	1 98.4	1 98.1	1 98.4	1 98.7
Farm products.....	105.4	104.9	105.5	104.9	104.6	104.5	104.3	105.6
Foods.....	98.9	98.3	98.7	99.3	99.3	98.4	99.5	99.7
Hides and leather products.....	118.8	118.8	118.9	118.9	118.9	118.9	118.9	118.8
Textile products.....	96.8	96.8	96.8	97.3	97.3	97.3	97.2	97.2
Fuel and lighting materials.....	79.5	79.6	79.5	79.5	79.2	79.0	78.9	78.9
Metals and metal products.....	1103.9	1103.9	1104.0	1104.0	1104.0	1104.0	1104.0	1104.0
Building materials.....	110.1	110.2	110.3	110.6	110.0	109.9	109.9	109.9
Chemicals and allied products.....	96.4	97.2	97.2	97.2	97.2	97.2	97.2	97.2
Housefurnishing goods.....	104.4	104.4	104.5	104.5	104.5	104.5	104.5	104.5
Miscellaneous.....	89.6	89.6	90.0	90.1	90.0	90.0	89.9	90.0
Raw materials.....	99.8	99.5	99.8	99.9	99.6	98.7	99.6	100.4
Semimanufactured articles.....	92.6	92.8	92.8	92.8	92.8	92.6	92.8	92.7
Manufactured products.....	1 98.8	1 98.7	1 98.9	1 98.9	1 98.8	1 98.8	1 98.8	1 98.9
All commodities other than farm products.....	1 96.9	1 96.9	1 97.0	1 97.2	1 97.1	1 96.7	1 97.1	1 97.2
All commodities other than farm products and foods.....	1 95.9	1 95.9	1 96.0	1 96.1	1 96.0	1 95.9	1 95.9	1 95.9

† † Preliminary.

Trend of Employment and Unemployment

SUMMARY OF REPORTS OF EMPLOYMENT FOR JULY 1942

RECENTLY revised estimates¹ of total employment in nonagricultural establishments in July 1942 indicate that 37,144,000 persons were engaged in activities other than agriculture or as proprietors, self-employed, domestic, or casual workers. This represents an increase of 478,000 from June and 2,205,000 from July 1941. These figures do not include work-relief personnel of the WPA, NYA, and CCC, nor the uniformed Army, Navy, Marine and Coast Guard personnel, and they are based on preliminary July and revised June reports.

The accelerated rate of production in war plants was reflected in the net accessions of 300,000 workers in manufacturing establishments, the largest rise since June of 1941. In addition, gains were reported in the Federal, State, and local government services (137,000); contract and Federal force-account construction (70,000); finance, service, and miscellaneous industries (37,000); transportation and public utilities (31,000); and mining (3,000). Employment in wholesale and retail trade establishments declined by 100,000, the usual seasonal decline being augmented by decreases resulting from Government restrictions in certain lines of trade.

The major portion of the employment gain of 2,205,000 over the year was in manufacturing industries, which increased by 1,515,000. The Federal-State-local government, transportation and public utility, and finance-service-miscellaneous groups also showed increases, while in trade, mining, and contract construction fewer workers were employed in July 1942 than a year ago. The decline in trade employment was substantial, 331,000.

Contraction in nonsupervisory personnel on work-relief programs during July amounted to 426,000, with the decreases distributed as follows; WPA 172,700, NYA 198,600, and CCC 54,700. The major factor in the NYA decline was the closing of the student-work program during the summer-vacation period.

Industrial and Business Employment

Increases in employment between mid-June and mid-July were reported by 85 of the 157 manufacturing and by 6 of the 16 nonmanufacturing industries.

¹ Mimeographed copies of explanatory text and the revised monthly estimates by groups from January 1939 to June 1942 are available upon request. These data will also be published in the next issue of the Monthly Labor Review.

The number of wage earners in the manufacturing industries regularly surveyed increased by 2.1 percent from June to July 1942. Corresponding weekly pay rolls increased by \$11,734,000 (3.1 percent). Normally at this time of the year there is a seasonal decline of 1.5 percent in factory employment and of 3.7 percent in pay rolls. The increases of 2.2 percent in employment and 3.4 percent in pay rolls in the durable goods group were due almost entirely to expansion in the shipbuilding, aircraft, instruments, electrical machinery, engines, ammunition, machine tools, and explosives industries. For the third successive month a substantial increase in employment (4.8 percent, or 17,700 workers) occurred in the automobile industry, where extensive conversion to production of war materials has taken place.

The seasonal rise in the canning and preserving industries accounted for three-fourths of the employment increase of 1.9 percent, or 91,600 in the nondurable goods group. Other sizable increases occurred in confectionery, beverages, slaughtering and meat packing, and baking. The continued expansion in the rubber-tire industry in July (6.0 percent or 3,500 wage earners) reflected increased production on government orders.

Reductions in employment due chiefly to material shortages and freeze orders took place in the following industries: plumbing supplies; cars, electric- and steam-railroad; paper and pulp; men's clothing; paper boxes; and rayon and allied products. Seasonal reductions accounted largely for the decreases in corsets, fertilizers, paints and varnishes, and glass. The July factory employment and pay-roll indexes, 142.2 and 204.3 respectively, on the 1923-25 base, exceeded all previous levels and represent increases of 8.9 percent and 33.8 percent over the July 1941 levels. The larger gains in pay rolls than in employment over the year reflect the increases in hours worked, overtime premiums, and wage-rate increases.

A seasonal employment decline of 2.7 percent, accompanied by a pay-roll loss of 1.5 percent, was reported by retail-trade establishments. All major retail groups shared in the employment decrease, the most pronounced occurring in the apparel group (9.9 percent). In the general-merchandise group the employment curtailment of 4.2 percent was less than the usual July decline. Factors contributing to the employment decline of 6.6 percent in retail trade between July 1941 and July 1942 were the losses of 21.2 percent in furniture and house-furnishings and 43.5 percent in the retail automotive group.

In wholesale trade a contraseasonal loss of 0.7 percent in employment was accompanied by a slight gain of 0.2 percent in pay rolls. The automotive group showed an employment loss of 1.7 percent, continuing the series of employment declines which began in the fall of 1941. Dry goods, machinery, and petroleum products firms also reported declines. The most pronounced gain among the more important wholesale groups occurred in farm products (1.7 percent).

Telephone and telegraph companies increased employment by 0.8 percent, and street railways and bus companies continued to hire additional workers, the increase of 1.1 percent raising the July employment level 7.7 percent above July 1941. Pay rolls increased 1.4 percent over the month and were nearly 20 percent higher than last July. Restrictions affecting expansion and repairs in the electric

light and power industry were reflected in the employment loss of 0.7 percent which continued the curtailment begun in September 1941. The decline over the year was 8.2 percent.

Employment increased in anthracite mines by 3.4 percent, and in bituminous coal mines by 0.6 percent, but pay rolls declined by 18.4 percent and 16.3 percent, respectively, due to decreased production caused by the observance of the miners' holiday and the 4th of July, as well as the inclusion of a large amount of vacation pay in the June pay roll. Employment in metal mines showed no change since June but pay rolls decreased by 1.6 percent. While employment was 3.5 percent higher than a year ago, the pay-roll index in this industry (100.3 percent of the 1929 average) was 26.4 percent above July of last year. Employment in iron mines increased 1.7 percent over the month interval, copper mines reported no change, lead and zinc mines reported a decline of 2.4 percent, and gold and silver mines showed a decrease of 4.5 percent. Employment remained at the June level in quarries and nonmetallic mines but was slightly reduced in crude petroleum production (0.5 percent).

Year-round hotels and dyeing and cleaning plants curtailed employment seasonally by 1.3 percent and 2.4 percent, respectively, and brokerage firms reduced personnel by 3.8 percent. Laundries reported a better-than-seasonal employment gain of 4 percent and insurance companies increased their staffs by 1.4 percent.

A preliminary report of the Interstate Commerce Commission for class I steam railroads showed an employment increase of 1.8 percent between June and July, the total number employed in July being 1,316,400. Corresponding pay-roll figures for July were not available when this report was prepared. For June they were \$244,237,000, an increase of \$3,756,000 since May.

Hours and earnings.—Average hours worked per week by manufacturing wage earners were 42.4 in July, a decrease of 0.5 percent since June. The corresponding average hourly earnings were 85.0 cents, an increase of 1.1 percent over the preceding month. The average weekly earnings of factory wage earners (both full- and part-time combined) were \$38.52, a gain of 1.1 percent since June. Of the 16 non-manufacturing industries regularly surveyed, 11 reported increases in average weekly earnings. Of the 14 nonmanufacturing industries for which man-hour information is available 7 showed increases in average hours worked per week, and 12 showed gains in average hourly earnings.

Wage-rate increases averaging 7.1 percent and affecting 565,522 factory wage earners were reported by 1,133 establishments out of a reporting sample of about 34,400 establishments employing 8,803,821 workers. The largest number of factory workers affected were in the following industries: shipbuilding (243,078), woolen and worsted goods (35,813), and foundries and machine shops (25,950). In the non-manufacturing industries, the largest numbers of workers affected by wage increases were reported by street-railway and bus companies, 11,804 employees; electric-light and power companies, 6,575 employees; and copper mines, 4,292 workers.

Employment and pay-roll indexes and average weekly earnings for June and July 1942 and July 1941 are given, where available, in table 1 for all manufacturing industries combined, selected nonmanufacturing industries, water transportation, and class I steam railroads.

TABLE 1.—*Employment, Pay Rolls, and Earnings in All Manufacturing Industries Combined and in Nonmanufacturing Industries July and June 1942 and July 1941*

[Preliminary]

Industry	Employment index			Pay-roll index			Average weekly earnings		
	July 1942	June 1942	July 1941	July 1942	June 1942	July 1941	July 1942	June 1942	July 1941
All manufacturing industries combined.....	(1923-25=100)			1923-25=100					
	142.2	139.3	130.6	204.3	198.1	152.7	\$38.52	\$38.00	\$31.22
Class I steam railroads ¹	(1935-39=100)			1935-39=100					
	129.0	126.7	116.4	(²)	(²)	(²)	(²)	(²)	(²)
Coal mining:	1929=100								
Anthracite.....	47.0	45.5	49.3	45.5	55.8	34.8	31.69	40.13	23.25
Bituminous.....	93.3	92.7	90.3	114.0	136.2	105.4	32.41	38.96	31.22
Metalliferous mining.....	81.8	81.8	79.0	100.3	102.0	79.3	38.49	39.12	31.62
Quarrying and nonmetallic mining.....	51.9	51.9	52.7	66.1	65.1	55.5	32.05	31.53	26.67
Crude petroleum production.....	57.4	57.6	62.1	63.4	63.1	61.4	40.43	40.00	36.05
Public utilities:									
Telephone and telegraph.....	93.2	92.5	88.3	125.1	125.3	115.7	32.71	33.03	32.04
Electric light and power.....	86.9	87.5	94.6	112.5	113.0	113.5	39.41	39.30	36.50
Street railways and busses.....	74.8	74.0	69.5	90.6	89.4	75.8	39.55	39.41	35.54
Trade:									
Wholesale.....	89.7	90.4	94.2	91.2	91.0	88.0	35.46	35.16	32.45
Retail.....	90.3	92.8	96.7	92.0	93.4	94.0	23.70	23.38	22.54
Hotels (year-round) ³	94.2	95.5	94.5	96.3	96.5	87.6	17.38	17.18	16.03
Laundries.....	119.4	114.8	115.8	119.3	115.2	106.7	20.77	20.86	19.15
Dyeing and cleaning.....	126.9	130.1	121.7	116.8	117.7	96.4	25.75	25.33	21.92
Brokerage ⁴	-3.8	-1.6	-17.0	-3.2	-3.0	-15.4	40.41	40.16	39.57
Insurance ⁴	+1.4	-1	+4	+2.7	-1	+7.5	38.44	37.97	37.37
Building construction ⁴	-4.2	-4.4	-24.2	-3.2	-1.7	-7.3	43.42	42.28	35.38
Water transportation ⁵	70.4	74.3	78.6	+4.3	+4.3	+41.2	(²)	(²)	(²)

¹ Preliminary. Source—Interstate Commerce Commission.² Not available.³ Cash payments only; the additional value of board, room, and tips cannot be computed.⁴ Indexes of employment and pay rolls not available. Percentage changes from June to July 1942, May to June 1942, and July 1941 to July 1942 substituted.⁵ Based on estimates prepared by the U. S. Maritime Commission covering steam and motor merchant vessels of 1,000 gross tons or over in deep-sea trades only. Pay-roll data include war bonuses and value of subsistence and lodging. Pay-roll indexes on 1929 base not available. Percentage changes from June to July 1942, May to June 1942, and July 1941 to July 1942 substituted.

Public Employment

The Federal Government, which had been adding employees at the rate of 97,000 a month from our entry into the war through June 1942, added 171,000 workers in the month of July. Of these, 4,000 were hired for work inside the District of Columbia and 167,000 for work outside. The aggregate Federal executive-service employment of 2,401,000 in July 1942, exceeded the level of the same month a year ago by 1,010,000. The increase over the year represented 73 percent for employment and 87 percent for pay rolls.

Employment on Federally-financed construction attained the record level of 1,856,000, with the addition of 162,000 workers during the month ending July 15, 1942. All the additional workers were engaged on war activities, mainly on shipbuilding and airport-construction projects, bringing the ratio of war- to nonwar-construction workers to 9 to 1. During the year ending July 15, 1942, employment on Federally financed war-construction projects increased 1,144,000 workers, but partially offsetting declines on nonwar projects reduced the gain to 1,025,000 (123 percent). The 185-percent pay-roll increase on Federally financed construction over the same period, in part represents overtime and more continuous employment. The Federal Government carried directly on its pay roll only 255,000 of all workers

engaged on Federally financed construction in July 1942; firms holding Government contracts carried the others.

The release of 430,000 persons during the month of July 1942 from WPA, NYA, and CCC programs showed the influence of the curtailment of appropriations for the 1942-43 fiscal year. The WPA released 173,000 workers, the NYA released 199,000, and the CCC 58,000. The major factor in the NYA decline was the nonoperation of the student-work program during the summer vacation period which affected 136,000 students. In the year ending July 1942, personnel on work-relief programs declined 933,000, leaving a total of 660,000 persons on the rolls, who received \$47,786,000 during the month of July.

Employment and Pay Rolls in Regular Federal Services and on Projects Financed Wholly or Partially From Federal Funds, July 1941 and June and July 1942

[Subject to revision]

Class	Employment			Pay rolls		
	July 1942	June 1942	July 1941	July 1942	June 1942	July 1941
Federal services:						
Executive ¹	2,401,305	2,230,075	1,391,689	\$385,994,597	\$356,102,113	\$205,977,306
Judicial.....	2,653	2,645	2,637	672,070	689,736	647,810
Legislative.....	6,541	6,539	6,142	1,377,363	1,377,155	1,334,763
Construction projects:						
Financed from regular Federal appropriations ²	1,777,439	1,603,236	714,632	342,260,980	294,450,200	110,445,411
War.....	1,657,517	1,489,121	554,847	322,917,628	275,491,192	91,919,933
Other.....	119,922	114,115	159,785	19,343,352	18,959,008	18,525,478
Public housing ³	25,618	33,395	98,002	4,004,555	5,060,497	12,242,587
War public works.....	7,603	6,589	(⁴)	917,637	779,177	(⁴)
Financed by PWA.....	77	243	6,351	10,794	29,860	807,747
Financed by RFC ⁵	45,357	50,547	11,807	9,604,039	9,094,551	1,908,303
War.....	43,563	48,807	9,420	9,242,176	8,609,386	1,587,160
Other.....	1,794	1,740	2,387	361,863	395,165	321,143
Work-relief programs:						
Work Projects Administration projects.....	525,146	607,819	1,054,901	42,499,000	47,923,771	68,231,116
War.....	241,504	285,146	357,424	19,234,000	19,869,656	22,033,112
Other.....	283,642	412,673	697,477	23,265,000	28,054,115	46,198,004
National Youth Administration.....	123,940	322,606	328,106	3,349,000	5,946,280	7,227,135
Student work program.....		135,977	5,370		960,214	25,787
Out-of-school work program.....	123,940	186,629	322,736	3,349,000	4,986,066	7,201,348
Civilian Conservation Corps..	10,799	69,261	210,125	1,938,342	3,804,201	10,386,746

¹ Includes force-account employees also included under construction projects, and supervisory and technical employees also included under CCC. Data for public employment offices which were nationalized in January 1942, are included in the figures for June and July 1942.

² Includes new Federal ship construction.

³ All Federal housing projects including those formerly under the United States Housing Authority.

⁴ Program not in operation.

⁵ Includes employees and pay roll of the RFC Mortgage Co.

DETAILED REPORTS FOR INDUSTRIAL AND BUSINESS EMPLOYMENT, JUNE 1942

Estimates of Nonagricultural Employment

IN table 1 are given estimates of nonagricultural employment by major groups. The figures for "Total civil nonagricultural employment" and "Civil employees in nonagricultural establishments" are based on the number of nonagricultural "gainful workers," shown by the 1930 Census of Occupations (minus the number who were unemployed for

1 week or more at the time of the Census) and on regular reports of employers to the United States Bureau of Labor Statistics and to other Government agencies. The estimates for the individual industry groups are based in large part on industrial censuses and on the above-mentioned regular reports of employers.

Estimates of "Employees in nonagricultural establishments" by States are given each month in a mimeographed release on employment and pay rolls.

TABLE 1.—*Estimates of Total Nonagricultural Employment, by Major Groups*

[In thousands]

Employment groups	June 1942 (preliminary)	May 1942	Change, May to June 1942	June 1941	Change, June 1941 to June 1942
Total civil nonagricultural employment ¹	41,479	41,309	+170	39,475	+2,004
Employees in nonagricultural establishments ²	35,336	35,166	+170	33,332	+2,004
Manufacturing	13,209	13,091	+118	12,154	+1,055
Mining	851	860	-9	876	-25
Contract construction ³	2,073	2,077	-4	1,816	+257
Transportation and public utilities	3,417	3,385	+32	3,239	+178
Trade	6,582	6,667	-85	6,861	-279
Finance, service and miscellaneous	4,315	4,310	+5	4,260	+55
Federal, State, and local government	4,889	4,776	+113	4,126	+763

¹ Excludes employees on WPA and NYA projects and enrollees in CCC camps. Includes proprietors, firm members, self-employed persons, casual workers, and domestic servants. Includes allowance for adjustment of factory and trade totals to preliminary 1939 Census figures.

² Excludes all of the groups omitted from "Total civil nonagricultural employment" as well as proprietors, firm members, self-employed persons, casual workers, and domestic servants.

³ Includes employees of construction contractors only. Does not include "force-account" construction workers—that is, those employed directly by other classes of employers.

Industrial and Business Employment

Monthly reports on employment and pay rolls are available for 157 manufacturing industries, and for 16 nonmanufacturing industries, including private building construction, water transportation, and class I steam railroads. The reports for the first 2 of these groups—manufacturing and nonmanufacturing—are based on sample surveys by the Bureau of Labor Statistics. The figures on water transportation are based on estimates prepared by the Maritime Commission, and those on class I steam railroads are compiled by the Interstate Commerce Commission.

The employment, pay-roll, hours, and earnings figures for manufacturing, mining, laundries, and dyeing and cleaning cover wage earners only, but the figures for public utilities, brokerage, insurance, and hotels relate to all employees except corporation officers and executives, while for trade they relate to all employees except corporation officers, executives, and other employees whose duties are mainly supervisory. For crude-petroleum production they cover wage earners and clerical field force. The coverage of the reporting samples for the various nonmanufacturing industries ranges from approximately 25 percent for wholesale and retail trade, dyeing and cleaning, and insurance, to approximately 80 percent for public utilities, and 90 percent for mining.

The general manufacturing indexes are computed from reports supplied by representative manufacturing establishments in 90 of the

157 industries surveyed. These reports cover more than 55 percent of the total wage earners in all manufacturing industries of the country and more than 65 percent of the wage earners in the 90 industries covered.

Data for both manufacturing and nonmanufacturing industries are based on reports of the number of employees and the amount of pay rolls for the pay period ending nearest the 15th of the month.

The average weekly earnings shown in table 2 are computed by dividing the weekly pay rolls in the reporting establishments by the total number of full- and part-time employees reported. As not all reporting establishments supply information on man-hours, average hours worked per week and average hourly earnings are necessarily based on data furnished by a slightly smaller number of reporting firms. Because of variation in the size and composition of the reporting sample, the average hours per week, average hourly earnings, and average weekly earnings shown may not be strictly comparable from month to month. The sample, however, is believed to be sufficiently adequate in virtually all instances to indicate the general movement of earnings and hours over the period shown.

EMPLOYMENT AND PAY-ROLL INDEXES, AVERAGE HOURS, AND EARNINGS

Employment and pay-roll indexes, as well as average hours worked per week, average hourly earnings, and average weekly earnings for April, May, and June 1942, where available, are presented in table 2. The April and May figures, where given, may differ in some instances from those previously published because of revisions necessitated primarily by the inclusion of late reports. Indexes of employment and pay rolls are given in table 3 for 55 additional manufacturing industries for the months of April, May, and June 1942. These indexes are based on 1939 as 100 and are available in mimeographed form for the period from January 1939 to January 1941, inclusive.

In table 4 indexes of employment and pay rolls are given for all manufacturing industries combined, for the durable- and nondurable-goods group of manufacturing industries, and for each of 13 non-manufacturing industries, by months, from June 1941 to June 1942, inclusive. The chart on page 636 indicates the trend of factory employment and pay rolls from January 1919 to June 1942.

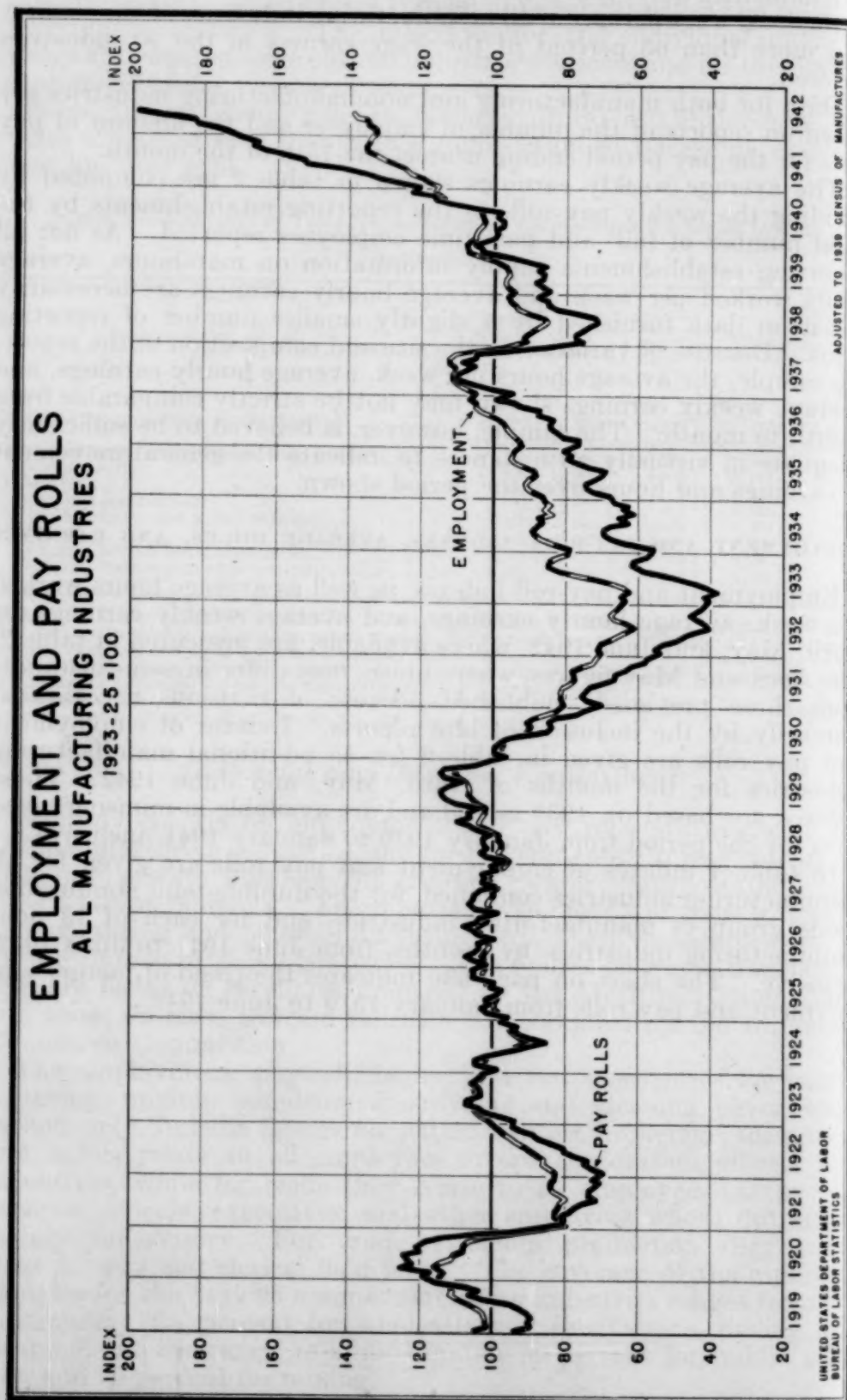


TABLE 2.—Employment, Pay Rolls, Hours, and Earnings in Manufacturing and Nonmanufacturing Industries

Trend of Employment and Unemployment

637

TABLE 2.—Employment, Pay Rolls, Hours, and Earnings in Manufacturing and Nonmanufacturing Industries
MANUFACTURING

[Indexes are based on 3-year average, 1923-25 = 100. For "all manufacturing," "durable goods," "nondurable goods," and "aluminum manufactures," they have been adjusted to preliminary 1939 Census figures. The indexes for all other manufacturing groups and industries have been adjusted to 1937 Census figures, except as otherwise noted, and are not comparable to indexes published in pamphlets prior to August 1939. Comparable series available upon request.]

Industry	Employment index			Pay-roll index			Average weekly earnings ¹			Average hours worked per week ¹			Average hourly earnings ¹		
	June 1942	May 1942	April 1942	June 1942	May 1942	April 1942	June 1942	May 1942	April 1942	June 1942	May 1942	April 1942	June 1942	May 1942	April 1942
All manufacturing¹	139.1	137.7	136.6	197.7	193.2	188.0	\$38.04	\$37.43	\$36.63	42.6	42.6	42.4	Cents 83.1	Cents 84.0	Cents 81.9
Durable goods¹	157.1	153.7	150.9	243.3	235.1	226.6	44.06	43.40	42.57	45.1	45.0	44.7	93.3	92.3	91.0
Nondurable goods¹	122.0	122.4	123.0	146.6	146.3	144.8	28.33	28.24	27.78	39.6	39.7	39.7	72.2	72.2	71.4
Durable goods															
Iron and steel and their products, not including machinery	135.4	134.9	135.4	186.2	184.0	181.6	39.84	39.82	39.99	42.6	42.6	42.2	93.7	93.3	92.6
Blast furnaces, steel works, and rolling mills	152.2	151.5	150.9	198.1	196.6	192.9	40.85	40.91	40.22	40.8	40.9	40.4	99.9	100.0	99.6
Bolts, nuts, washers and rivets	176.2	173.7	172.1	291.4	292.2	284.8	30.50	40.31	39.08	45.1	45.7	45.8	88.0	88.2	86.6
Cast-iron pipe	95.9	97.5	98.0	135.7	133.3	130.0	34.08	32.77	31.82	43.8	43.1	42.6	77.0	75.7	74.5
Cutlery (not including silver and plated cutlery) and edge tools	128.2	128.4	131.5	182.0	183.1	179.4	36.48	36.66	35.57	46.0	46.3	46.2	81.1	81.0	77.8
Forgings, iron and steel	131.0	129.2	128.1	241.0	241.4	237.8	50.51	51.05	50.43	48.1	49.4	49.3	103.3	102.4	102.1
Hardware	92.0	89.4	92.3	141.3	135.2	136.1	37.36	36.78	35.89	46.3	46.4	45.9	80.8	79.3	78.3
Plumbers' supplies ¹	73.8	77.8	80.9	91.5	90.9	92.5	35.47	33.62	33.00	41.7	40.0	39.5	84.8	84.0	83.5
Stamped and enameled ware	203.8	204.1	206.4	316.6	310.3	305.0	36.32	35.66	34.51	44.3	44.1	43.8	82.5	81.2	79.6
Steam and hot-water heating apparatus and steam fittings	119.7	120.3	121.7	173.0	173.8	174.1	42.67	42.85	42.71	46.2	46.7	46.5	92.7	91.9	92.0
Stoves ¹	87.0	88.9	92.0	107.2	104.7	109.8	34.97	33.41	33.84	42.5	41.2	41.6	82.7	81.5	81.5
Structural and ornamental metalwork	118.2	115.6	114.0	155.0	149.2	145.6	41.63	41.14	40.85	46.0	45.7	45.7	90.8	90.3	89.4
Tin cans and other tinware	107.3	107.9	111.2	143.2	141.3	145.4	29.83	29.36	29.21	40.5	40.2	40.0	74.5	73.8	73.8
Tools (not including edge tools, machine tools, files, and saws)	155.3	154.0	154.7	245.2	241.2	237.7	30.50	38.87	38.24	47.9	47.6	47.6	82.0	81.7	80.4
Wirework	154.5	151.9	155.3	249.3	241.2	234.6	38.59	38.32	36.71	45.1	45.3	44.7	85.4	84.9	82.3
Machinery, not including transportation equipment¹	206.4	203.1	200.0	342.5	332.4	321.7	46.01	45.38	44.56	48.1	47.8	47.5	95.2	94.2	93.0
Agricultural implements (including tractors)	167.2	166.9	167.4	262.7	259.1	249.6	43.07	42.55	40.93	43.1	43.2	42.9	100.2	98.6	95.5
Cash registers, adding machines, and calculating machines	185.9	179.1	174.9	293.6	292.6	262.4	49.40	51.10	46.71	47.3	48.6	47.2	105.0	105.8	99.6
Electrical machinery, apparatus, and supplies	(²)	(²)	(²)	(²)	(²)	(²)	42.62	42.21	41.80	46.4	46.0	45.8	92.6	91.8	91.3

See footnotes at end of table.

TABLE 2.—Employment, Pay Rolls, Hours, and Earnings in Manufacturing and Nonmanufacturing Industries—Continued
MANUFACTURING—Continued

Industry	Employment index			Pay-roll index			Average weekly earnings ¹			Average hours worked per week ¹			Average hourly earnings ¹		
	June 1942	May 1942	April 1942	June 1942	May 1942	April 1942	June 1942	May 1942	April 1942	June 1942	May 1942	April 1942	June 1942	May 1942	April 1942
Durable goods—Continued															
Machinery—Continued															
Engines, turbines, water wheels, and windmills ⁴	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)
Foundry and machine-shop products	165.1	162.8	160.3	249.8	241.9	234.9	\$56.20	\$56.11	\$56.20	49.1	49.2	49.1	113.7	113.8	114.6
Machine tools	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)
Radios and phonographs	191.4	196.4	208.9	251.4	283.3	292.2	36.50	35.33	34.31	53.8	54.1	53.9	97.4	96.5	94.4
Textile machinery and parts	108.5	109.0	110.8	159.5	158.3	157.5	40.86	40.49	39.55	49.3	49.4	48.9	79.9	78.5	77.0
Typewriters and parts	101.8	114.9	125.7	157.1	160.5	171.0	37.85	34.24	33.35	45.0	42.0	42.8	83.9	81.3	77.7
Transportation equipment^{4,6}															
Aircraft ⁴	272.1	255.0	239.9	434.9	403.1	392.2	50.21	50.17	49.71	48.7	46.9	47.0	107.1	106.9	105.7
Automobiles ⁷	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	46.75	46.44	46.07	47.2	47.6	47.3	99.6	98.9	97.5
Cars, electric- and steam-railroad	91.2	87.6	84.1	142.2	136.2	131.3	50.20	50.08	50.29	44.0	43.7	44.2	113.7	114.2	113.3
Locomotives ⁸	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	43.76	43.47	42.15	43.4	43.4	43.1	100.8	100.2	97.7
Shipbuilding	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	48.29	50.47	50.91	46.6	48.3	49.1	103.7	104.5	103.8
	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	52.82	53.67	53.30	48.2	48.8	49.2	109.2	109.0	108.0
Nonferrous metals and their products															
Aluminum manufactures ⁹	145.6	145.9	145.6	218.5	214.2	210.5	41.17	40.53	40.01	44.6	44.2	44.2	92.3	91.1	89.7
Brass, bronze, and copper products	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	40.71	41.46	41.36	44.1	45.1	45.0	92.9	92.2	92.1
Clocks and watches and time-recording devices	112.3	114.5	112.1	178.1	176.0	167.3	45.75	44.75	44.56	45.9	45.2	45.6	99.9	99.4	98.1
Jewelry	90.3	95.8	99.6	102.9	108.1	108.9	35.05	34.26	33.21	45.3	44.5	44.5	77.9	77.0	74.6
Lighting equipment	84.7	86.8	89.3	104.0	102.5	104.4	30.52	30.08	29.32	43.5	43.2	42.2	71.2	70.0	68.9
Silverware and plated ware	65.2	65.8	66.0	82.2	81.1	79.6	38.05	36.68	36.33	43.1	43.1	44.2	88.4	85.1	82.2
Smelting and refining—copper, lead and zinc	99.9	100.8	101.5	133.5	130.2	128.8	36.72	35.93	35.25	43.8	44.0	44.1	85.0	82.7	80.8
	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	(⁵)	37.48	36.39	35.21	41.5	40.6	40.0	90.7	89.4	88.0
Lumber and allied products⁴															
Furniture ⁴	73.3	73.3	73.4	93.7	90.4	87.3	27.38	26.68	25.71	41.4	41.2	40.4	65.9	64.4	63.2
Lumber:	94.6	96.1	97.0	112.2	114.8	112.5	27.89	28.05	27.26	41.8	41.7	41.1	67.7	67.7	66.7
Sawmills	70.3	70.2	70.4	74.5	71.0	69.8	29.93	28.70	28.09	43.2	42.4	42.1	69.3	67.6	66.3
Millwork ¹⁰	65.3	64.9	64.6	84.6	78.8	75.0	26.28	25.09	23.97	40.7	40.5	39.5	64.6	62.0	60.6
Stone, clay, and glass products															
Brick, tile, and terra cotta	93.9	94.3	95.4	104.2	105.5	104.9	30.40	30.58	30.00	38.6	39.0	38.8	78.0	77.1	76.7
Cement	69.8	70.6	70.4	72.5	72.4	71.2	27.37	27.07	26.71	39.1	38.9	38.9	70.7	70.0	68.9
Glass	83.8	82.3	79.9	100.7	95.1	91.0	33.91	32.67	32.22	40.8	40.5	40.4	82.5	80.6	79.7
Glass	121.2	123.6	123.6	156.0	146.6	141.6	31.58	32.90	32.08	37.7	38.9	38.5	83.6	83.5	83.4
Marble, granite, slate, and other products	38.2	33.5	33.7	32.7	27.8	32.9	30.41	29.20	29.27	36.2	40.2	38.3	77.6	72.1	77.7
Pottery	116.6	118.4	119.6	131.7	134.4	131.4	28.60	28.79	28.46	37.8	38.2	38.2	76.0	75.1	73.9

Nondurable goods

Cement	83.8	82.3	79.9	100.7	99.1	33.94	32.67	32.22	40.8	40.5	40.4	82.5	80.6	79.7
Glass	121.2	123.6	125.6	166.6	164.6	31.58	32.99	32.08	37.7	38.9	38.5	83.6	83.5	83.4
Marble, granite, slate, and other products	38.2	33.5	39.7	32.7	27.8	30.41	29.25	29.27	39.2	40.2	38.3	77.6	72.1	77.7
Porters	116.5	118.4	119.6	131.7	134.4	28.61	28.79	28.46	37.8	38.2	38.2	75.0	75.1	73.9

Nondurable goods																													
Textiles and their products																													
Fabrics	108.8	111.7	113.1	123.2	128.7	126.9	128.9	23.49	23.70	23.37	38.6	39.0	39.1	60.3	60.4	59.9													
Carpets and rugs	104.5	104.7	105.2	129.0	128.7	76.9	126.8	32.82	33.64	29.23	40.2	40.3	40.3	59.5	58.3	58.3													
Cotton goods	70.0	67.4	70.6	81.2	76.9	138.3	148.6	21.63	21.67	21.05	41.1	41.1	41.0	52.8	51.4	51.4													
Cotton small wares	114.5	114.4	114.1	133.2	133.3	138.3	148.6	21.63	21.67	21.05	41.1	41.1	41.0	52.8	51.4	51.4													
Dyeing and finishing textiles	111.8	110.0	111.7	103.1	103.1	138.3	148.6	21.63	21.67	21.05	41.1	41.1	41.0	52.8	51.4	51.4													
Hats, fur-felt	128.2	132.8	137.8	142.9	147.7	156.7	156.7	27.21	27.11	27.70	41.3	41.4	42.6	65.8	64.9	64.9													
Hosiery	65.3	58.3	68.3	66.6	59.0	65.9	65.9	28.21	27.89	26.67	33.3	32.7	31.6	83.8	84.2	83.5													
Knitted underwear	119.9	122.1	125.3	148.2	149.2	149.2	149.2	21.75	21.49	20.96	36.0	36.3	35.7	60.2	59.1	59.1													
Knitted outerwear	78.5	81.0	82.2	82.0	80.1	83.8	83.8	21.61	21.95	21.48	38.2	38.8	38.6	56.2	55.9	54.7													
Knitted underwear	88.7	88.6	88.9	111.2	110.3	110.7	110.7	21.04	20.89	20.92	39.6	39.4	39.8	52.5	52.3	52.1													
Knitted cloth	152.4	155.0	156.2	165.7	170.7	171.3	171.3	25.10	25.46	25.28	40.9	41.3	41.3	60.9	60.9	60.2													
Silk and rayon goods	63.8	63.5	63.0	71.0	70.8	70.5	70.5	23.24	23.28	23.31	40.5	40.6	40.5	57.2	57.5	57.8													
Woolen and worsted goods	105.8	105.5	104.1	134.2	132.0	132.0	127.0	29.44	28.97	28.31	40.5	40.6	40.4	72.9	71.5	71.0													
Wearing apparel	113.8	122.7	123.4	119.5	123.4	121.2	123.4	22.51	23.70	21.85	35.1	36.4	37.0	61.8	62.7	63.2													
Clothing, men's	117.9	121.9	123.4	112.3	121.2	121.2	121.2	24.16	23.87	23.54	35.2	36.8	37.2	58.1	58.6	58.9													
Clothing, women's	140.0	160.9	166.2	106.7	140.5	152.5	152.5	21.42	23.87	25.09	34.7	36.8	37.0	68.1	60.8	63.8													
Corsets and allied garments	109.1	112.6	116.2	143.3	150.7	159.1	159.1	21.83	22.20	22.70	37.6	38.3	39.4	57.8	57.9	57.6													
Men's furnishings	110.6	112.3	113.5	136.9	140.1	139.0	139.0	19.00	18.70	18.36	36.3	36.0	35.2	52.0	51.8	51.6													
Millinery	51.1	65.6	78.6	37.0	44.7	66.4	66.4	22.13	20.83	25.80	27.8	27.5	32.4	73.6	71.5	72.5													
Shirts and collars	128.1	131.1	132.5	151.2	158.2	159.1	159.1	18.78	19.13	19.06	36.4	37.1	37.5	51.8	51.8	51.2													
Leather and its manufactures																													
Boots and shoes	97.1	98.7	100.5	111.2	112.6	105.7	110.4	24.92	24.84	25.21	37.4	38.0	38.8	65.2	65.0	67.8													
Leather	92.7	94.0	95.8	122.0	122.0	122.9	123.6	32.88	32.46	40.8	40.8	40.8	41.0	81.2	80.5	79.1													
Food and kindred products																													
Baking	141.8	135.6	132.8	170.0	160.3	160.2	152.9	30.30	29.96	29.18	41.5	40.9	40.4	74.3	74.1	73.2													
Beverages	154.1	150.9	149.6	174.8	166.3	160.2	160.2	31.41	30.45	29.52	42.9	42.4	41.8	73.1	71.7	70.6													
Butter	312.8	316.7	298.1	423.8	444.8	395.8	395.8	38.72	41.12	38.89	41.1	42.7	41.3	97.3	97.0	95.1													
Canning and preserving	126.1	118.6	111.4	128.9	119.2	109.4	109.4	26.57	26.06	25.63	46.9	46.2	45.5	56.1	55.6	55.3													
Confectionery	133.6	105.8	103.6	157.0	120.4	117.2	117.2	22.42	21.71	21.52	38.1	38.3	35.9	61.6	61.6	61.3													
Flour	79.4	82.8	87.9	98.6	97.3	103.0	103.0	22.78	22.55	22.52	39.5	38.3	38.9	60.8	58.3	58.3													
Ice cream	78.3	77.1	77.7	92.3	87.6	85.5	85.5	31.35	30.42	29.38	44.3	43.7	42.9	69.4	68.7	67.6													
Slaughtering and meat packing	93.8	86.9	77.9	91.4	82.2	73.9	73.9	33.04	32.21	32.11	46.7	46.0	45.6	69.7	69.5	70.0													
Sugar, beet	145.7	138.4	134.0	184.3	169.7	162.3	162.3	32.89	31.87	31.49	40.8	39.9	39.5	80.7	80.0	80.0													
Sugar refining, cane	51.9	50.0	46.0	71.3	67.0	60.7	60.7	36.10	35.04	34.52	39.7	39.4	38.7	91.0	89.1	90.2													
Tobacco manufactures	87.2	93.0	94.0	88.6	89.5	91.3	91.3	28.58	27.26	27.53	37.7	37.4	38.0	72.4	72.9	72.4													
Cheating and smoking tobacco and snuff	63.8	62.7	64.4	77.5	73.3	73.6	73.6	22.16	21.25	20.82	39.5	37.7	37.6	57.5	56.5	55.4													
Cigars and cigarettes	51.4	51.3	51.9	75.8	71.3	73.1	73.1	23.86	22.49	22.79	37.2	36.7	38.1	63.2	61.2	59.9													
Paper and printing	65.3	64.1	65.9	77.6	73.4	73.5	73.5	21.85	21.02	20.46	38.6	37.8	37.4	55.8	54.9	54.9													
Boxes, paper	117.2	119.1	120.8	130.4	131.9	139.2	139.2	33.71	34.62	33.45	39.0	39.5	39.6	88.6	87.6	86.8													
Paper and pulp	122.9	126.7	131.4	164.1	169.2	173.2	173.2	26.50	26.21	26.50	40.0	40.0	40.1	66.8	66.3	65.9													
Printing and publishing	125.9	128.4	129.8	168.0	170.8	172.1	172.1	33.08	32.93	32.84	41.6	42.4	42.7	76.5	77.7	76.9													
Book and job	96.7	97.9	99.5	93.3	94.5	96.2	96.2	33.56	33.63	33.67	38.9	39.1	39.4	86.9	86.6	86.0													
Newspapers and periodicals	112.4	113.2	113.7	114.4	114.1	114.0	114.0	41.06	40.78	40.51	36.0	36.0	35.8	112.5	111.6	110.8													

See footnotes at end of table.

Trade:	90.4	91.2	92.7	91.0	91.7	92.2	35.16	35.20	34.57	41.3	41.4	41.2	85.8	85.2	84.3
Wholesale 13 18	92.8	94.0	94.3	93.4	94.0	93.6	23.38	23.08	23.00	41.8	41.6	41.7	90.8	90.8	90.2
Retail 13 18	114.5	114.8	113.5	117.9	116.2	113.2	26.66	26.13	25.84	41.6	41.3	41.3	60.8	60.1	60.1
Food 13	108.4	109.5	108.6	109.0	108.5	108.0	19.73	19.45	19.48	38.0	37.6	37.8	61.7	61.5	61.2
General merchandising 13 18	90.9	93.2	94.8	92.2	92.2	92.2	23.45	22.91	23.11	37.6	37.4	37.4	61.7	61.7	61.8
Apparel 13	63.5	66.5	68.6	65.3	69.5	71.2	31.69	32.15	31.90	44.1	44.3	44.4	75.3	75.4	76.8
Furniture and housefurnishings 13	54.3	57.3	59.9	58.6	60.6	62.5	31.06	31.48	31.13	47.5	47.9	47.5	69.7	69.3	66.3
Automotive 13	71.2	72.9	72.8	80.1	81.4	79.1	31.06	30.95	30.18	42.9	43.0	42.8	75.6	73.7	72.0
Lumber and building materials 13	95.5	96.1	95.2	96.5	95.4	93.5	17.18	17.14	16.91	45.1	45.0	45.4	38.0	37.4	36.9
Hotels (year-round) 13 18	114.8	113.7	110.3	115.2	113.8	108.6	20.86	20.98	20.59	43.8	43.6	43.4	48.5	48.6	47.8
Laundries 11	130.1	127.6	121.3	117.7	113.1	105.7	25.33	24.85	24.20	46.5	44.5	44.5	57.1	57.0	55.9
Dyeing and cleaning 11	-1.6	-3.8	-4.0	-3.0	-3.8	-3.3	40.10	40.84	40.66	(12)	(12)	(12)	(12)	(12)	(12)
Brokerage 13 18 11	-1.1	-7	-4	-1	+2	-6	37.97	37.73	38.10	37.2	36.7	35.4	113.6	113.7	110.5
Insurance 13 18	-4.4	-2	+5.4	-1.7	+5.0	+7.7	42.28	41.75	39.10	(12)	(12)	(12)	(12)	(12)	(12)
Building construction 13	74.3	74.1	73.6	+4.3	+9.2	+13.5	(12)	(12)	(12)	(12)	(12)	(12)	(12)	(12)	(12)
Water transportation 13	126.7	124.5	121.6	(12)	(12)	(12)	(12)	(12)	(12)	(12)	(12)	(12)	(12)	(12)	(12)
Class 1 steam railroads 13															

¹ A bulletin giving averages by years, 1932 to 1940, inclusive, and by months, January 1932 to November 1941, inclusive, available on request. Average hours and average hourly earnings are computed from data supplied by a smaller number of establishments than average weekly earnings, as not all reporting firms furnish man-hours. The figures are not strictly comparable from month to month because of changes in the size and composition of the reporting sample.

² See tables 9, 10, and 11 in the December 1940 issue of "Employment and Pay Rolls" for comparable series back to January 1919 for all manufacturing and back to January 1923 for the durable- and nondurable-goods groups.

³ See table 7 in the April 1941 issue of "Employment and Pay Rolls" for revised figures from January 1940 to March 1941.

⁴ Revisions in the following industries and groups have been made as indicated: Stores—January, February and March 1942 employment indexes to 92.1, 94.6, 93.2; pay-roll indexes to 94.9, 104.6, 107.1; average weekly earnings to \$29.18, \$31.32, \$32.54; average weekly hours to 38.5, 40.4, 41.2; average hourly earnings to 76.0, 77.7, and 79.3 cents. Lumber group—March employment index to 74.0; pay-roll index to 86.4.

Cotton small wares—January, February and March 1942 employment indexes to 106.0, 109.2, 111.2; January, February and March 1942 average weekly earnings to \$23.90, \$25.62, \$26.09; January average hours to 41.5; February average hourly earnings to 59.8 cents. *Dyeing and finishing textiles*—January, February and March 1942 employment indexes to 133.8, 136.3, 137.8; pay-roll indexes to 142.6, 148.5, 151.5; January and February 1942 average weekly earnings to \$25.90, \$26.39; January and February average hourly earnings to 63.1 and 63.4 cents.

Cigars and cigarettes—March 1942 pay-roll index to 70.6; average weekly earnings to \$19.34.

Paper group—March 1942 employment index to 121.6.

Printing, book and job—March 1942 pay-roll index to 97.5; average weekly earnings to \$33.67; average hourly earnings to 85.6 cents.

Printing, newspapers—March 1942 employment index to 113.8; average weekly earnings to \$40.57; average weekly hours to 36.0.

Footnote continued on next page.

(Footnotes continued from previous page)
Additional revised figures given in the following table:

	Employ- ment	Pay roll	Average weekly earnings	Average hours worked per week	Average hourly earnings
<i>Machinery group</i>					<i>Cents</i>
1941:					
February.....	147.8	176.6			
March.....	156.3	197.5			
April.....	162.7	217.5			
May.....	168.0	230.3			
June.....	172.7	233.7			
July.....	177.0	244.5			
August.....	179.3	249.6			
September.....	181.0	257.8			
October.....	182.5	257.6			
November.....	185.0	273.4			
December.....					
1942:					
January.....	186.8	289.3	\$43.00		
February.....	191.6	300.2	43.49		
March.....	196.1	313.3	44.34		
<i>Engines, turbines, water wheels, and windmills</i>					
1941:					
January.....			39.99	46.1	86.8
February.....			38.75	45.3	85.6
March.....			40.46	46.2	87.7
April.....			38.67	43.3	89.0
May.....			43.70	46.5	93.9
June.....			45.58	46.8	97.4
July.....			45.86	46.4	99.1
August.....			46.96	46.4	101.6
September.....			47.59	47.1	101.7
October.....			49.41	47.2	104.8
November.....			51.76	47.5	109.1
December.....			52.61	48.1	109.2
1942:					
January.....			57.61	50.1	114.9
February.....			55.58	49.3	112.4
March.....			57.31	50.0	114.9

	Employ- ment	Pay roll	Average weekly earnings	Average hours worked per week	Average hourly earnings
<i>Furniture—Continued</i>					<i>Cents</i>
1942:					
January.....	101.6	110.5	\$25.47		64.1
February.....	102.2	115.7	26.46		64.9
March.....	100.9	114.9	26.75	41.0	65.5
<i>Rubber products</i>					
1941:					
December.....	110.1				
1942:					
January.....	99.3				
February.....	98.5		34.88		
March.....	98.4		36.32		
<i>Rubber tires and inner tubes</i>					
1941:					
December.....	84.5		37.35	35.4	
1942:					
January.....	74.8		40.05	37.0	108.5
February.....	72.8		40.62	38.0	
March.....	73.3		42.27	39.3	

¹ Included in total and group indexes, but not available for publication separately.

² Adjusted on basis of a complete employment survey of the aircraft industry made by the Bureau of Labor Statistics for August, 1940. Not comparable with previously published indexes from January 1939 to August 1940, inclusive. Comparable figures for this period given in table 9 of the September 1940 issue of "Employment and Pay Rolls."

³ The indexes for "Automobiles" have been adjusted to 1933 Census figures, but not to later Census figures because of problems involving integrated industries.

⁴ See footnote 7 in table 5 of October 1941 "Employment and Pay Rolls" for revised employment and pay-roll indexes, average hours worked per week, average hourly earnings, and average weekly earnings in locomotives, August 1940 to July 1941, inclusive.

⁵ See table 8 in March 1941 "Employment and Pay Rolls" pamphlet for revised figures from January 1935 to December 1940, and footnote 11, table 2 in June 1942 Monthly Labor Review for revised figures from January 1941 to December 1941.

⁶ Because of changes in composition of the reporting sample, hours and earnings are not comparable with those previously published as indicated:

Millwork—Average weekly earnings and average hourly earnings. *Sugar, beet*—Average hourly earnings.

comparable with those previously published as indicated:
Millwork—Average weekly earnings and average hourly earnings. *Sugar, beet*—Average hourly earnings.

114.9
112.4
114.9

50.1
49.3
50.0

55.58
57.31

February
March

Transportation equipment

1941:

September 191.1
October 203.5
November 210.7
December 209.4

252.9
282.5
288.5
291.7

1942:

January 211.3
February 217.3
March 226.8

331.8
340.0
354.6

Aircraft

1941:

September
October
November
December

38.23
39.29
39.84
42.50

45.5
45.2
44.4
46.3

1942:

January
February
March

46.78
44.97
45.24

48.7
47.7
47.6

Furniture

1941:

October
November
December

120.7
118.7
120.5

26.62
25.95
26.61

62.3
63.7
63.8

Chewing and smoking tobacco and snuff—Average hourly earnings.

¹¹ Indexes adjusted to 1935 Census. Comparable series back to January 1929 presented in January 1938 issue of pamphlet.

¹² See table 7 of October 1940 "Employment and Pay Rolls" for revised employment and pay-roll indexes, average hours worked per week, average hourly earnings, and average weekly earnings in anthracite mining, February 1940 to September 1940, inclusive.

¹³ See table 7 of February 1941 pamphlet for revised figures for metalliferous mining from January 1938 to January 1941, inclusive.

¹⁴ Does not include well-drilling or rig-building.

¹⁵ Average weekly earnings, hourly earnings, and hours are not comparable with figures published in pamphlets prior to January 1938, as they now exclude corporation officers' executives, and other employees whose duties are mainly supervisory.

¹⁶ Retail-trade indexes adjusted to 1935 Census and public-utility indexes to 1937 Census. Not comparable to indexes published in pamphlets prior to January 1940 or in Monthly Labor Review prior to April 1940, with but one exception, retail furniture, which has been revised since publication of July 1940 pamphlet, back to January 1936. Comparable series for earlier months available upon request.

¹⁷ Covers street-railways and trolley and motorbus operations of subsidiary, affiliated, and successor companies; formerly "electric-railroad and motorbus operation and maintenance."

¹⁸ Indexes adjusted to 1933 Census. Comparable series in November 1934 and subsequent issues of "Employment and Pay Rolls."

¹⁹ Cash payments only; additional value of board, room and tips cannot be computed.

²⁰ Indexes of employment and pay rolls are not available; percentage changes from preceding month substituted.

²¹ See note 18 in table 9 in the July 1941 issue of "Employment and Pay Rolls" for revised average weekly earnings in the brokerage industry from January 1939 to January 1941.

²² Not available.

²³ Based on estimates prepared by the United States Maritime Commission covering employment on steam and motor merchant vessels of 1,000 gross tons or over in deep-sea trades only. Pay-roll indexes not available. Percentage changes from preceding month substituted.

²⁴ Preliminary. Source—Interstate Commerce Commission.

TABLE 3.—Indexes of Employment and Pay Rolls in 55 Additional Manufacturing Industries

[12-month average 1939=100]

Industry	Employment			Pay rolls		
	June 1942	May 1942	Apr. 1942	June 1942	May 1942	Apr. 1942
Iron and steel group:						
Metal doors and shutters.....	141.3	140.4	133.0	205.5	195.8	170.9
Firearms.....	(1)	(1)	(1)	(1)	(1)	(1)
Screw-machine products.....	308.3	298.1	288.5	515.0	489.5	470.1
Wire drawing.....	141.8	139.8	138.7	196.4	190.8	185.7
Wrought pipe not made in rolling mills.....	185.4	177.9	175.5	314.2	288.4	273.7
Steel barrels, kegs, and drums.....	120.8	128.1	136.9	182.1	192.9	207.1
Machinery group:						
Machine-tool accessories.....	(1)	(1)	(1)	(1)	(1)	(1)
Pumps.....	270.4	258.9	253.1	529.0	491.1	474.3
Refrigerators and refrigerating apparatus.....	88.1	90.0	110.6	127.7	124.6	151.8
Sewing machines.....	128.6	135.2	139.4	222.8	229.4	239.0
Washing machines, wringers, and driers.....	95.1	104.8	108.3	147.3	154.8	153.3
Transportation-equipment group:						
Motorcycles, bicycles, and parts.....	139.1	131.9	129.6	219.2	202.3	189.8
Nonferrous-metals group:						
Sheet-metal work.....	148.9	150.3	152.6	220.7	218.0	222.4
Smelting and refining of scrap metal.....	169.4	164.4	161.0	243.5	232.8	223.3
Lumber group:						
Caskets and morticians goods.....	96.8	96.8	99.4	126.9	123.1	123.2
Wood preserving.....	117.3	117.5	117.1	176.8	174.8	169.1
Wood, turned and shaped.....	114.0	112.9	113.2	159.4	153.5	151.5
Wooden boxes, other than cigar.....	127.1	125.4	124.0	189.0	185.7	178.7
Mattresses and bedsprings.....	106.4	113.9	122.1	133.8	142.0	169.6
Stone, clay, and glass products group:						
Abrasive wheels.....	207.8	204.5	201.3	306.3	313.1	290.1
Asbestos products.....	136.8	136.6	134.7	205.5	203.3	189.3
Lime.....	118.0	118.3	118.8	166.1	170.0	164.2
Gypsum.....	108.4	109.0	109.7	143.2	144.3	133.1
Glass products made from purchased glass.....	118.0	122.2	125.5	145.9	150.2	150.0
Wallboard and plaster, except gypsum.....	128.9	127.6	125.3	170.7	163.5	153.5
Textiles:						
Textile bags.....	121.6	118.2	122.0	150.2	143.8	145.7
Cordage and twine.....	139.5	141.0	142.4	211.5	210.7	201.2
Curtains, draperies, and bedspreads.....	94.6	99.6	103.5	129.0	136.2	144.4
Housefurnishings, other.....	135.0	126.9	120.8	180.5	163.2	152.4
Jute goods, except felt.....	109.9	109.4	117.6	162.3	161.8	152.8
Handkerchiefs.....	93.2	94.6	95.4	129.9	129.7	126.3
Leather group:						
Boot and shoe cut stock and findings.....	96.8	98.1	102.3	125.8	129.7	133.2
Leather gloves and mittens.....	150.1	146.7	144.0	198.3	194.7	189.1
Trunks and suitcases.....	178.9	177.4	169.4	204.2	210.9	199.7
Food group:						
Cereal preparations.....	111.5	111.3	114.2	146.9	144.6	152.3
Condensed and evaporated milk.....	154.0	146.0	137.2	201.1	188.2	170.2
Feeds, prepared.....	120.5	115.3	114.2	163.0	151.8	143.7
Paper and printing group:						
Paper bags.....	118.6	123.5	131.9	152.1	163.9	168.7
Envelopes.....	114.0	117.1	118.5	131.3	133.9	137.7
Paper goods, not elsewhere classified.....	120.9	123.5	123.9	142.6	147.5	147.0
Bookbinding.....	108.2	107.1	107.7	142.2	139.1	141.4
Lithographing.....	89.8	94.0	96.0	97.9	104.9	106.3
Chemical, petroleum, and coal products:						
Ammunition.....	(1)	(1)	(1)	(1)	(1)	(1)
Compressed and liquefied gases.....	161.6	157.5	155.4	236.6	222.4	217.3
Perfumes and cosmetics.....	100.3	100.8	102.2	117.6	118.9	117.4
Coke-oven products.....	124.1	121.4	121.6	156.3	153.6	151.0
Paving materials.....	83.5	80.6	88.3	119.6	112.9	116.1
Roofing materials.....	125.3	124.9	122.5	178.9	172.2	157.0
Miscellaneous group:						
Chemical fire extinguishers.....	(1)	(1)	(1)	(1)	(1)	(1)
Buttons.....	118.4	123.0	122.0	174.7	178.2	173.4
Instruments, professional, scientific, and commercial.....	(1)	(1)	(1)	(1)	(1)	(1)
Optical goods.....	(1)	(1)	(1)	(1)	(1)	(1)
Photographic apparatus.....	135.2	132.6	130.9	192.1	186.1	177.9
Pianos, organs, and parts.....	90.5	96.6	100.4	120.9	126.2	123.6
Toys, games, and playground equipment.....	116.7	121.1	121.7	158.7	161.3	157.9

1 Not available for publication separately.

TABLE 4.—Indexes of Employment and Pay Rolls in Selected Manufacturing¹ and Nonmanufacturing² Industries, June 1941 to June 1942

Industry	1941								1942					
	Av.	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June
Employment														
Manufacturing														
All industries.....	127.7	127.9	130.6	133.1	135.2	135.4	134.8	134.2	132.5	133.8	135.1	136.6	137.7	139.1
Durable goods ³	134.0	135.1	137.6	138.7	142.1	144.0	144.6	144.2	143.3	145.1	147.5	150.9	153.7	157.1
Nondurable goods ⁴	121.6	121.1	123.9	127.7	128.7	127.3	125.4	124.8	122.1	123.0	123.2	123.0	122.4	122.0
Nonmanufacturing														
Anthracite mining ⁵	49.7	49.2	49.3	50.0	50.0	50.3	50.2	49.1	49.0	48.8	48.4	47.8	48.2	45.5
Bituminous-coal mining ⁵	86.2	88.1	90.3	92.6	94.2	95.3	95.1	95.5	95.1	94.5	93.7	93.5	92.9	92.7
Metalliferous mining ⁶	77.6	78.9	79.0	79.9	79.4	79.7	79.5	80.2	80.7	81.0	81.9	81.9	82.2	81.8
Quarrying and nonmetallic mining.....	49.8	51.9	52.7	53.9	54.2	54.1	52.6	50.9	46.8	46.7	47.7	50.3	51.7	51.9
Crude-petroleum production.....	61.0	61.5	62.1	62.2	61.8	61.6	60.9	61.1	61.3	60.6	59.7	58.8	58.1	57.6
Telephone and telegraph ⁷	86.3	86.3	88.3	89.6	90.3	90.6	90.1	90.0	90.4	90.3	90.5	91.2	91.7	92.5
Electric light and power ⁷	92.7	93.5	94.6	95.2	94.9	94.1	93.4	93.1	92.0	90.5	89.6	88.9	88.0	87.5
Street railways and busses ^{7,8}	69.3	69.1	69.5	69.7	70.3	70.3	70.2	70.6	70.4	70.7	71.2	72.1	72.9	74.0
Wholesale trade.....	94.0	93.8	94.2	95.8	95.6	96.3	96.3	96.3	94.9	94.3	93.9	92.7	91.2	90.4
Retail trade ⁷	98.0	97.8	96.7	96.9	100.0	101.0	103.0	113.0	95.4	94.0	94.4	94.3	94.0	92.8
Year-round hotels ⁵	95.0	95.0	94.5	94.5	95.7	96.2	96.1	95.3	94.2	94.1	93.5	95.2	96.1	95.5
Laundries ⁵	108.5	112.0	115.8	114.6	113.0	111.2	108.9	108.4	108.8	107.6	107.9	110.3	113.7	114.8
Dyeing and cleaning ⁵	115.1	122.7	121.7	118.9	121.5	121.2	117.2	113.3	109.8	109.5	113.8	121.3	127.6	130.1
Pay rolls														
Manufacturing														
All industries.....	148.8	152.2	152.7	158.1	162.6	167.0	165.4	169.9	173.5	178.3	182.9	188.0	193.2	197.7
Durable goods ³	167.8	173.9	172.2	177.6	183.3	191.4	190.3	195.4	204.3	219.6	217.3	226.6	235.1	243.3
Nondurable goods ⁴	127.6	127.9	130.7	136.3	139.5	139.6	137.4	141.3	139.0	142.1	144.3	144.8	146.3	146.6
Nonmanufacturing														
Anthracite mining ⁵	41.4	51.2	34.8	51.1	49.6	49.2	41.8	35.9	39.4	49.6	50.9	44.7	51.5	55.8
Bituminous-coal mining ⁵	99.6	107.2	105.4	117.3	115.5	122.6	116.4	119.9	117.1	118.2	116.7	118.3	122.1	136.2
Metalliferous mining ⁶	81.9	85.3	79.3	85.4	85.9	88.3	89.8	93.7	94.3	98.4	99.1	99.1	100.8	102.0
Quarrying and nonmetallic mining.....	51.8	55.7	55.5	59.3	60.5	61.5	57.5	55.8	48.9	52.0	54.4	58.1	63.0	65.1
Crude-petroleum production.....	60.5	59.9	61.4	61.5	64.4	64.4	64.2	64.6	64.8	64.8	62.6	63.2	62.0	63.1
Telephone and telegraph ⁷	112.7	113.0	115.7	116.4	117.3	117.0	118.3	122.9	120.9	120.9	121.8	122.2	125.0	125.3
Electric light and power ⁷	111.2	111.4	113.5	115.1	115.0	115.7	115.2	115.2	114.6	113.7	113.5	113.5	113.4	113.0
Street railways and busses ^{7,8}	75.4	76.2	75.8	78.6	78.1	78.4	78.5	80.0	80.5	83.7	84.7	84.4	86.8	89.4
Wholesale trade.....	87.1	88.4	88.0	89.8	90.9	92.0	91.6	92.8	91.8	93.7	93.9	92.2	91.7	91.0
Retail trade ⁷	93.4	95.2	94.0	94.0	95.8	97.3	98.5	107.8	94.6	93.9	93.7	93.6	94.0	93.4
Year-round hotels ⁵	88.5	87.4	87.6	88.2	90.0	91.9	93.2	93.3	91.5	92.6	91.6	93.5	95.4	96.5
Laundries ⁵	99.3	102.5	106.7	104.7	105.2	103.4	101.9	102.6	103.8	102.5	104.3	108.6	113.8	115.2
Dyeing and cleaning ⁵	90.4	98.4	96.4	92.1	99.5	98.5	93.0	88.6	86.5	85.6	92.7	105.7	113.1	117.7

¹ 3-year average 1923-25=100—adjusted to preliminary 1939 Census of Manufactures. See tables, 9, 10, and 11 of December 1940 "Employment and Pay Rolls" for comparable figures back to January 1919 for "all manufacturing" and January 1923 for "durable goods" and "nondurable goods."

² 12-month average for 1929=100. Comparable indexes for wholesale trade, quarrying, metal mining, and crude-petroleum production are in November 1934 and subsequent issues of "Employment and Pay Rolls" or in February 1935 and subsequent issues of Monthly Labor Review. For other nonmanufacturing indexes see notes 5, 6, and 7.

³ Includes: Iron and steel, machinery, transportation equipment, nonferrous metals, lumber and allied products, and stone, clay, and glass products.

⁴ Includes: Textiles and their products, leather and its manufactures, food and kindred products, tobacco manufactures, paper and printing, chemicals and allied products, products of petroleum and coal, rubber products, and a number of miscellaneous industries not included in other groups.

⁵ Indexes have been adjusted to the 1935 Census. Comparable series from January 1929 forward are presented in January 1938 and subsequent issues of the pamphlet. See also table 7 of October 1940 pamphlet for revised figures for anthracite mining, February to September 1940.

⁶ See table 7 of February 1941 pamphlet for revised indexes January 1938 to January 1941.

⁷ Retail-trade indexes adjusted to 1935 Census and public-utility indexes to 1937 Census. Not comparable with indexes published in "Employment and Pay Rolls" pamphlets prior to January 1940 or in Monthly Labor Review prior to April 1940. Comparable series January 1929 to December 1939 available in mimeographed form.

⁸ Covers street railways and trolley and motorbus operations of subsidiary, affiliated, and successor companies.

EMPLOYMENT AND UNEMPLOYMENT IN JULY 1942

EMPLOYMENT in the United States increased by 700,000 between June and July 1942, according to returns from the WPA sample Monthly Report of Employment and Unemployment. At the same time the labor force showed an increase equal to the expansion in employment, while the volume of unemployment remained unchanged.

TABLE 1.—*Estimated Civilian Labor Force, Employment, and Unemployment, by Months, April 1940–July 1942*

Month	Estimated number (millions of persons)								
	1942			1941			1940		
	Labor force	Em- ployed	Unem- ployed ¹	Labor force	Em- ployed	Unem- ployed ¹	Labor force	Em- ployed	Unem- ployed ¹
January.....	53.2	48.9	4.3	53.0	45.3	7.7	(2)	(2)	(2)
February.....	53.4	49.4	4.0	52.9	45.7	7.2	(2)	(2)	(2)
March.....	54.5	50.9	3.6	52.7	45.8	6.9	(2)	(2)	(2)
April.....	53.7	50.7	3.0	53.5	46.8	6.7	53.9	45.1	8.8
May.....	54.2	51.6	2.6	54.2	48.5	5.7	54.7	46.3	8.4
June.....	56.1	53.3	2.8	56.2	50.2	6.0	56.2	47.6	8.6
July.....	56.8	54.0	2.8	56.6	50.9	5.7	56.9	47.6	9.3
August.....				56.4	51.0	5.4	56.6	47.7	8.9
September.....				54.8	50.3	4.5	54.9	47.9	7.0
October.....				54.1	50.2	3.9	54.4	47.0	7.4
November.....				54.1	50.2	3.9	53.7	46.3	7.4
December.....				54.0	50.2	3.8	53.4	46.3	7.1

¹ Includes persons on public emergency projects.

² Not available.

The increase in the labor force between June and July reflects the entry of students into the labor market as school terms ended and summer vacations began. In the age group 14–24 years, employment rose by 800,000 and unemployment went up 200,000, resulting in an increase of a million young persons in the labor force. An even larger increase in the number of young persons in the labor market took place between May and June. During both periods the increase recorded among the younger workers was partially offset by a decline in labor-market activity among persons aged 25–54.

It is significant that despite the entry of large numbers of men into the armed forces during the past year, the civilian labor force was higher in July 1942 than it was in July of the previous year. This was caused by substantial increases in the number of women and older persons in the labor force and a greater-than-normal influx of younger persons into the labor market.

TABLE 2.—*Estimated Civilian Labor Force, Employment, and Unemployment, by Age Groups, June and July of 1940, 1941, and 1942*¹

Labor market status and age	1942		1941		1940	
	July	June	July	June	July	June
Estimated number (millions of persons)						
Labor force.....	56.8	56.1	56.6	56.2	56.9	56.2
14 to 24 years.....	14.9	13.9	14.9	14.3	15.1	14.2
25 to 54 years.....	33.3	33.6	33.5	33.6	34.3	34.1
55 years and over.....	8.6	8.6	8.2	8.3	7.8	7.9
Employed.....	54.0	53.3	50.9	50.2	47.6	47.6
14 to 24 years.....	13.6	12.8	12.5	11.9	10.9	10.6
25 to 54 years.....	32.3	32.4	31.0	30.9	29.9	30.2
55 years and over.....	8.1	8.1	7.4	7.4	6.8	6.8
Unemployed.....	2.8	2.8	5.7	6.0	9.3	8.6
14 to 24 years.....	1.3	1.1	2.4	2.4	4.2	3.6
25 to 54 years.....	1.0	1.2	2.5	2.7	4.1	3.9
55 years and over.....	.5	.5	.8	.9	1.0	1.1
Unemployment rate (percent) ²						
All age groups.....	4.9	5.1	10.0	10.7	16.4	15.3
14 to 24 years.....	8.5	8.1	15.9	17.0	27.6	25.6
25 to 54 years.....	3.2	3.7	7.3	7.9	12.1	11.4
55 years and over.....	5.0	5.6	10.5	11.1	14.1	13.4
Percentage distribution of unemployed						
All age groups.....	100.0	100.0	100.0	100.0	100.0	100.0
14 to 24 years.....	45.9	39.7	41.7	40.5	44.4	42.3
25 to 54 years.....	38.6	43.6	43.0	44.2	43.8	45.5
55 years and over.....	15.5	16.7	15.3	15.3	11.8	12.2

¹ All data exclude persons in institutions. Persons on public emergency work projects are included with the unemployed.

² Unemployed as a percent of labor force in each age group.

Recent Publications of Labor Interest

SEPTEMBER 1942

Child Labor

Employment of minors. (In Industrial Bulletin, New York State Department of Labor, Albany, March 1942, pp. 94-96.)

Shows extent of employment of children in New York State in 1940 and 1941, as reflected by employment certificates issued.

Occupational hazards to young persons: Report No. 4, The logging and sawmilling industries; Report No. 5, Woodworking machines. Washington, U. S. Children's Bureau, 1942. 81 and 53 pp. (Bureau publications Nos. 276 and 277.)

Report No. 1 of this series deals with the explosives-manufacturing industries, report No. 2 with motor-vehicle drivers and helpers, and report No. 3 with the coal-mining industry. Report No. 6 is reviewed below.

Radioactive substances. By William M. Schmidt, M. D. Washington, U. S. Children's Bureau, 1942. 20 pp.; mimeographed. (Occupational hazards to young workers, report No. 6.)

The report gives the results of a study by the U. S. Children's Bureau of working conditions in several plants engaged in painting dials with self-luminous compound and one plant manufacturing incandescent mantles, and reviews earlier studies by other investigators of the hazards of radioactive substances.

It was found that, in spite of great improvements in safe practices since the many deaths from radium poisoning in the earlier days of the industry, there continues to be some hazard in the industry. As these hazards are greater for young persons, the Children's Bureau considered it desirable to adopt an 18-year minimum-age standard for employment.

Civilian Conservation Corps

My brush monkeys: A narrative of the CCC. By Albert W. Jernberg. New York, Richard R. Smith, 1941. 283 pp., illus.

The author, a reserve officer of the United States Army, tells in the first person of his 4 years' experience as a company commander of the CCC.

Youth in the CCC. Prepared for American Youth Commission by Kenneth Holland and Frank Ernest Hill. Washington, American Council on Education, 1942. 263 pp., illus.

A description of the background of the CCC, its operation, and its accomplishments.

Cooperative Movement

The people's business: The progress of consumer cooperatives in America. By Joshua K. Bolles. New York, Harper & Bros., 1942. 170 pp., bibliography, illus.

Popularly written account of consumers' cooperatives in the United States.

EDITOR'S NOTE.—The Bureau of Labor Statistics does not distribute the publications to which reference is made in this list, except those issued by the Bureau itself. For all others, please write to the respective publishing agencies mentioned.

People's year book, 1942. Manchester, England, Cooperative Wholesale Society, [1941?]. 224 pp., illus.

Includes detailed information on the condition of the cooperative movement in Great Britain, as well as some information for several other countries.

Conference papers to be read at 25th conference of Indian Economic Association, Bombay, January 1942. (In *Indian Journal of Economics*, Allahabad, January 1942; 638 pp.)

A large proportion of the papers at this conference related to various aspects of the cooperative movement in India and suggestions for improvement.

Report of Irish Agricultural Organization Society, Ltd., for year ending December 31, 1941. Dublin, 1942. 86 pp.

Contains statistics on the various types of agricultural cooperatives, including credit societies.

Loi portant organisation de la coopération. (In *Correspondance Economique Roumaine*, bulletin officiel du Ministère de l'Économie Nationale, Bucharest, July–September 1941, pp. 70–173.)

Text in French and German of 1935 Rumanian law on cooperatives, as amended during the period 1938–41.

Problems of cooperative organizations. By W. B. Stout. Washington, U. S. Department of Agriculture, Extension Service, 1941. 36 pp.; mimeographed. (Extension Service circular 372.)

Among the problems discussed are those in connection with membership relations, management, financing, and operating policies. A list of references for further study is appended.

Cost and Standards of Living

Changes in cost of living and wage adjustments—a selected list of references with excerpts from certain studies. Princeton, N. J., Princeton University, Industrial Relations Section, 1942. 22 pp.; mimeographed. (Bibliographical series, No. 61.)

Food consumption of 538 farm and 299 village families in Vermont. By Virginia Britton. Burlington, Vermont Agricultural Experiment Station, 1941. 46 pp. (Bull. No. 474.)

Quantity and cost budgets for three income levels (prices for San Francisco, March 1942). Berkeley, University of California, Heller Committee for Research in Social Economics, 1942. 95 pp.; mimeographed.

Contains budgets for the family of an executive, a white-collar worker, and a wage earner. In 1942 the Heller Committee made rather extensive revisions in its yearly budgets. The size of the family in the budgets for the white-collar worker and the wage earner was reduced from five to four to conform to the typical American family, found by the census to be 3.8 persons. This affected all items varying with number and ages of children. Medical and dental allowances were completely revised, and minor revisions were made in other items. The base period for the index of the change in the cost of living was shifted from 1929 to the average for March of 1939, 1940, and 1941. In addition to the standard budgets, a series of wartime economy budgets is included.

Quantity and cost budget for dependent families or children (prices for San Francisco, March 1942). Berkeley, University of California, Heller Committee for Research in Social Economics, 1942. 37 pp.; mimeographed.

This budget, first priced in November 1931 and repriced annually, shows a minimum standard of expenditure for dependent families or children. It is designed for use in determining the relief to be given in San Francisco to families of different sizes and ages and the allowances for dependent children, and also to aid social workers in assisting families in allocating expenditures as wisely as possible.

Some contrasts in levels of living of women engaged in farm, textile mill, and garment plant work. By Dorothy Dickins. State College, Miss., Mississippi State College, Agricultural Experiment Station, 1941. 53 pp., charts. (Bull. No. 364.)

La lucha contra la carestía de la vida (Latin America). By Moisés Poblete Troncoso. (In *Acción Social*, Caja de Seguro Obligatorio, Santiago, Chile, March 1942, pp. 43-46.)

Summary of certain legislation enacted or policies pursued in Argentina, Brazil, Chile, Colombia, Costa Rica, Cuba, Ecuador, Mexico, Peru, and Venezuela, from 1932 through March 1940, to prevent speculation and an artificial increase in the cost of living.

La lucha contra la carestía de la vida y la función de los municipios [Chile]. By Moisés Poblete Troncoso. (In *Acción Social*, Caja de Segurs Obligatorio, Santiago, Chile, April 1942, pp. 44-51.)

Examines the reasons for the high cost of living in Chile and suggests remedies which the municipalities may apply. A table showing variations in cost-of-living indexes in different American and European countries, 1929-41, is included.

Public dining halls in Mexico City. By Anna Kalet Smith. (In *The Child*, U. S. Children's Bureau, Washington, June 1942, pp. 306, 307.)

Account of the public dining rooms established by the Mexican Government to provide nutritious meals at nominal cost to families and individuals with low incomes. The article states the conditions for admission, and sample menus are given.

Economic and Social Problems

Commission to Study the Organization of Peace: Second report—the transitional period, and papers presented to the commission. New York, Carnegie Endowment for International Peace, Division of Intercourse and Education, April 1942. 135 pp. (International Conciliation, No. 379.)

The papers in the report consider the practical problems which must be faced from now on if the peace as well as the war is to be won. Some of the subjects covered are public health and nutrition in the period of transition, the economic aftermath of the war, problems relating to migration and settlement, problems of education after the war, and political conditions of the period of transition.

Parity, parity, parity. By John D. Black. Cambridge, Harvard Committee on Research in the Social Sciences, 1942. 367 pp., charts.

Several chapters deal with the relation between industrial wages and agricultural income. The author recognizes the rise in labor productivity as a basis for increases in the wages of urban workers, but he argues that a larger share of the benefits of increased productivity should go to farmers in the form of lower priced industrial goods or goods of better quality for the same money.

The unfinished task: Economic reconstruction for democracy. By Lewis Corey. New York, Viking Press, 1942. 314 pp.

Democracy in economic life may best be promoted, in the view of the author, by "the cooperation of technical-managerial and professional groups in the middle class with labor unions, independent business, and the farmers." The functions of government in the economic field should be exercised in large measure, according to the author, by semi-independent corporations, somewhat similar to the Tennessee Valley Authority.

German man power: the crucial factor. By Fritz Sternberg. Washington, Brookings Institution, 1942. 44 pp. (Pamphlet No. 36.)

Development of the thesis that limitations of German manpower for industrial production may be the decisive factor of the war.

Russia's economic front for war and peace—an appraisal of the three five-year plans. By A. Yugow. New York, Harper & Bros., 1942. 279 pp.

Concerned chiefly with the five-year plans of industrialization in the Soviet Union, their underlying ideas, methods of prosecution, and results obtained.

Education and Guidance

Digest of annual reports of State boards for vocational education to U. S. Office of Education, Vocational Division, fiscal year ended June 30, 1941. Washington, U. S. Office of Education, Vocational Division, 1942. 50 pp., charts.

History of vocational guidance, origins and early development. By John M. Brewer. New York, Harper & Bros., 1942. 344 pp.

Principles and techniques of guidance. By D. Welty Lefever, Archie M. Turrell, Henry I. Weitzel. New York, Ronald Press Co., 1941. 522 pp., bibliographies.

Report of the Commission on Post-War Training and Adjustment; A statement of principles relating to educational problems of returning soldiers, sailors, and displaced war industry workers. New York, Columbia University, Teachers College, Institute of Adult Education, 1942. 54 pp.

The Commission was composed of 45 men and women, representing various educational fields, appointed in April 1942 by the Institute of Adult Education, Teachers College, Columbia University.

Teacher training for industry. By C. C. Aiken and Scott B. Lilly. New York and London, McGraw-Hill Book Co., Inc., 1942. 144 pp., diagrams, illus.

Uncle Sam's fighting men. By Robert K. Burns and Lyle M. Spencer. Chicago, Science Research Associates, 1942. 56 pp., bibliography, illus. (American job series, Occupational monograph No. 28.)

Describes the organization of the Army, Navy, and Air Force, and the training provided in different trades.

Handicapped Workers

Centros de readaptación profesional de inválidos. By Hermes Ahumada P. (In Previsión Social, Ministerio de Salubridad, Previsión y Asistencia Social, Santiago, July-October 1941, pp. 33-41.)

This article includes a brief summary of Governmental efforts in various countries for the occupational rehabilitation of disabled workers, the number and occupations of disabled workers in Chile receiving social assistance from various funds, and Chilean public and private institutions engaged in the work of occupational rehabilitation.

Interim scheme for the training and resettlement of disabled persons. London, Ministry of Labor and National Service, 1941. 8 pp.

Information on the British plan for training the disabled was published in the Monthly Labor Review for February 1942 (p. 407).

Rehabilitation of the deaf and the hard of hearing: A manual for rehabilitation case workers. Washington, U. S. Office of Education, 1942. 87 pp., charts, illus. (Vocational rehabilitation series, Bull. No. 26.)

Health and Industrial Hygiene

An analysis of industrial hygiene activities in State and local health departments, 1940-41. By V. M. Trasko and J. J. Bloomfield. (In Public Health Reports, U. S. Public Health Service, Washington, June 5, 1942, pp. 853-872.)

Manual on industrial health for defense. Boston, Massachusetts Committee on Public Safety, Division of Health and Social Services, 1942. 30 pp.

Contains the recommendations of the Committee regarding the organization and function of local industrial health committees, occupational-disease prevention, and the provision of medical and nursing services for workers in the war industries.

Report of Committee on Industrial Health in Factories [Great Britain]. London, British Medical Association, 1941. 43 pp.

The report deals with industrial medical service in the light of the existing medical system in Great Britain and discusses possible future developments. The committee's recommendations cover the organization of industrial medical services and the need for more emphasis in medical education on the relationship of industry to health and disease.

Fatigue as a problem of industrial health. By Benjamin F. Jones, M. D. (In Pennsylvania's Health, Pennsylvania Department of Health, Harrisburg, April 1942, pp. 28-39.)

The author discusses present hours of work in industry as an index of fatigue and British experience with wartime problems of industrial fatigue and efficiency.

A study of silicosis in the silica brick industry. By William B. Fulton and others. Harrisburg, Pennsylvania Department of Health, Bureau of Industrial Hygiene, 1941. 60 pp., charts, illus.

The study, covering an industry in which there is an exposure of from 96 percent to 98 percent free silica, showed that of 1,035 silica-brick workers given physical examinations 538, or 51.9 percent, were diagnosed as having silicosis.

Interim report of New York State Commission to Formulate a Long Range Health Program. Albany, 1941. 194 pp., illus. (Legislative document, 1941, No. 83.)

Contains information on a preliminary survey of hospital facilities in New York State and their possible expansion in the defense program, development of laboratory services, a study of general medical and surgical cases for 1939, and hospital care for mental cases.

Housing and Town Planning

Annual report of United States Housing Authority (nondefense activities), for fiscal year 1941. Washington, Federal Public Housing Authority, National Housing Agency, 1942. 145 pp., charts, illus.

Covers the activities of the Authority and affiliated local housing authorities in supplying public housing for low-income families during the period July 1, 1940, through June 30, 1941.

Housing and the increase in population. By M. H. Naigles. Washington, U. S. Bureau of Labor Statistics, 1942. 24 pp., charts. (Serial No. R. 1421, reprint from April 1942 Monthly Labor Review.)

Greenbelt. By O. Kline Fulmer. Washington, American Council on Public Affairs, [1941]. 46 pp.

An account of the historical background, development, and various features of the Government-built town of Greenbelt, Md. One chapter is devoted to the cooperative activities of the residents, along lines of social welfare, consumers' cooperation, health, recreation, etc.

Better cities. By Charles S. Ascher. Washington, U. S. National Resources Planning Board, 1942. 22 pp.

Suggestions for building better cities after the war. The objectives listed include broad planning, disregard of unrealizable claims on land value, and better methods of construction.

Overture to planning. By F. J. Osborn. London, Faber & Faber, Ltd., 1941. 29 pp. (Rebuilding Britain series, No. 1.)

The author views the war effort as bound up with an acceleration of social change, and takes up the important issues to be met in future planning of the physical environment.

When we build again. London, George Allen & Unwin, Ltd., 1941. 138 pp., illus. (Bournville [England] Village Trust research publication.)

A study based on research into conditions of living and working in Birmingham.

Industrial Relations

A study of grievance and arbitration procedures in collective bargaining agreements. New York, Bureau of Personnel Administration, 1941. 143 pp.; mimeographed.

The employer unit for collective bargaining in National Labor Relations Board decisions. By Emily Clark Brown. (In Journal of Political Economy, Chicago, June 1942, pp. 321-356.)

Human problems in production supervision, Section I: Sources of problems in present-day labor relations. By Joseph H. Vertrees. Ann Arbor, Mich., Edwards Bros., Inc., 1941. 22 pp.

The first of a series of pamphlets on management and labor problems, being issued by Mr. Vertrees. Subjects of other numbers in the series include adjustment of complaints and correction of causes of grievances, selection and orientation of new employees, training problems, and safety provisions.

Labor relations and the war. By William M. Leiserson. (In Antioch Review, Vol. II, No. 1, Yellow Springs, Ohio, March 1942, pp. 76-89.)

Critical analysis of the efforts made by the United States Government, through the setting up of labor boards and the appointment of representatives of organized labor to these and other agencies, to work out means by which labor can participate successfully in a Government program for dealing with labor relations. The agencies discussed include the National Defense Mediation Board, the National War Labor Board, the Office of Production Management (superseded by the War Production Board), and the War Labor Conference. The work of the

Conciliation Service of the U. S. Department of Labor, whose commissioners represent the Government only, is also considered.

The government of labor relations in Sweden. By James J. Robbins. Chapel Hill, University of North Carolina Press, 1942. 367 pp.

A description and history of the collective contract system in Sweden, with particular attention to the Labor Court.

Strikes and lockouts in Canada and other countries, 1941. (In Labor Gazette, Department of Labor, Ottawa, May 1942, pp. 520-550, charts; also reprinted.)

Data on number of strikes and lock-outs, workers involved, and man-working-days lost from this cause are given for Canada for each year from 1901 to 1941, and for each of nine other countries, by year, for varying periods from 1919 to 1941. The detailed data for Canada include information on causes, results, and method of termination of the disputes, in individual industries.

Labor Organizations and Their Activities

Union security. By National War Labor Board. (In Personnel Journal, New York, May 1942, pp. 10-22.)

Text of order of the Board and opinions of its public, labor, and employer members on the issue of union security as raised in the Walker-Turner Co. case with the United Electrical, Radio, and Machine Workers of America.

Out of the depths: The story of John R. Lawson, a labor leader. By Barron B. Beshoar. Denver, Denver Trades and Labor Assembly, Colorado Labor Historical Committee, 1942. 372 pp.

A biography of John R. Lawson, whose work was identified with the coal industry.

Asociaciones de trabajadores del Ecuador. Quito, Ministerio de Previsión Social y Trabajo, Dirección General del Trabajo, Oficina Central de Estadística y Colocación, 1942. 48 pp.

After a brief historical introduction, tables show for each province of Ecuador the names of workers' associations recognized by the Government through 1941, number of members, and date of approval of their statutes.

Chartist portraits. By G. D. H. Cole. London, Macmillan & Co., Ltd., 1941. 378 pp.

The story of Chartism in the British working population is presented in biographical sketches of some of its leaders. In choosing the leaders the selection was so made as to illustrate different phases of the movement.

Forty-third annual report of General Federation of Trade Unions [Great Britain], for year ending March 31, 1942. London, 1942. 47 pp.

General report on activities, with information on membership and finance.

Annual report and balance sheet of South African Trades and Labor Council, for period January 1 to December 31, 1941, for consideration by annual conference, April 6-10, 1942. Johannesburg, 1942. In Dutch and English; various paging.

Migration and Migratory Labor

Ill fares the land: Migrants and migratory labor in the United States. By Carey McWilliams. Boston, Little, Brown & Co., 1942. 419 pp., bibliography.

A study of all phases of the migratory farm-labor problem in the United States. The book deals with two types of agricultural migrants—the depression or removal migrants, who have been displaced from agriculture and set adrift on the land, and the habitual migrant, or migratory worker, who has followed an established migratory route for years. In general, the order of the material follows the main lines of inquiry followed by the Senate and House committees of the United States Congress which have investigated both depression and defense migration.

State control of interstate migration of indigents. By Edward W. Adams. (In Michigan Law Review, Ann Arbor, March 1942, pp. 711-733.)

The legal questions involved in the interstate migration of persons are discussed and some suggestions made as to corrective legislation.

Third interim report of Select Committee Investigating National Defense Migration, House of Representatives, 77th Congress, 2nd session. Washington, 1942. 109 pp. (Union calendar No. 670, House report No. 1879.)

The report repeats the recommendations made in the second interim report dealing with the need for a single procurement agency to effect all-out war production and achieve full use of labor supply.

Occupations

The book of opportunities—a dictionary of jobs: Personal sidelights on 4,000 American occupations. By Rutherford Platt. New York and London, G. P. Putnam's Sons, 1942. 506 pp. 3d ed.; rev.

Handbook of careers. Edited by Herbert Burstein. New York, Thesis Publishing Co., 1941. 120 pp.

A collection of articles by different writers describing the work and duties of employees in various occupations and professions, training requirements and courses of instruction, opportunities for employment, and salaries.

A functional pattern technique for classification of jobs. By Edwin W. Davis. New York, Columbia University, Teachers College, 1942. 128 pp., bibliography, charts. (Contributions to education, No. 844.)

In this study the relationships between job titles and the functions performed by men in the advertising profession were analyzed with a view to developing a new technique of job classification. The fundamental procedures of this new technique are applicable to many fields of business, education, or science.

Trade and job analysis. By Verne C. Fryklund. Milwaukee, Bruce Publishing Co., 1942. 167 pp.

A presentation of the underlying principle of trade and job analysis which can be applied to any occupation that is involved enough to require instruction.

Careers in wildlife management. By Charles N. Elliott. Chicago, Science Research Associates, 1942. 49 pp., bibliography, illus. (American job series, Occupational monograph No. 29.)

The monograph contains information on the duties of positions concerned with the conservation and management of American wildlife, qualifications for the work, training, and wages. Estimates given in the pamphlet place the number of persons engaged in all phases of wildlife work in the United States—Federal, State, and private—at over 200,000. This figure includes temporary and part-time workers as well as those on a full-time basis.

Personnel Management

Personnel management and industrial relations. By Dale Yoder. New York, Prentice-Hall, Inc., 1942. 848 pp.

Analysis and description of present-day labor relations. In addition to a general discussion of personnel management some of the subjects dealt with are job analysis, training for industry, industrial unrest, working hours, wage plans and policies, employees' health, employment stabilization, employee representation, collective bargaining, and personnel services. Reading lists on these subjects are included.

Employee suggestion systems: Formal plans for compensating employees for constructive ideas. New York, National Industrial Conference Board, Inc., 1942. 92 pp. (Studies in personnel policy, No. 43.)

Describes the plans of 23 companies for compensating employees for suggestions and gives some of the reasons why such plans have not always been successful.

Employee thrift plans in wartime. By F. Beatrice Brower. New York, National Industrial Conference Board, Inc., 1942. 40 pp. (Studies in personnel policy, No. 42.)

The study covers sale of United States war bonds to employees; credit unions and other savings and loan plans; company savings plans; and employee stock-purchase plans.

Employment tests in industry and business—a selected, annotated bibliography. By Hazel C. Benjamin. Princeton, N. J., Princeton University, Industrial Relations Section, April 1942. 32 pp.

How to create job enthusiasm. By Carl Heyel. New York and London, McGraw-Hill Book Co., Inc., 1942. 248 pp., illus.

Industrial psychology. By Joseph Tiffin. New York, Prentice-Hall, Inc., 1942. 386 pp., charts, illus.

The book deals with applications of psychology that have been made in industry. These applications cover employee selection and placement, the improvement of merit rating, reduction of accidents, solution of visual problems, increasing the accuracy of inspection, improvements in training methods, and the measurement and improvement of employee morale.

Social Security

Agricultural workers and social insurance. By John J. Corson. (In *Journal of Farm Economics*, Menasha, Wis., February 1942, pp. 285-295.)

It is pointed out that the term social security, now a household word, "still has no reality for many millions who work for a living—among them the farm laborer, the sharecropper, the tenant farmer, and the independent farm operator." The administrative problems of extending social security to these groups are discussed. The author concludes that although there are special difficulties in the way, social-insurance coverage for agricultural workers "can and should be provided immediately."

Bibliography on war measures of foreign countries in social insurance and related fields. By Fred Sapier and Arthur F. Ackerman. (In *Social Security Bulletin*, U. S. Social Security Board, Washington, April 1942, pp. 74-87.)

La invalidez en la Caja de Seguro Obligatorio de Enfermedad e Invalidez [Chile]. By Oscar Avendaño M. (In *Previsión Social*, Ministerio de Salubridad, Previsión y Asistencia Social, Departamento de Previsión Social, Santiago, July-October 1941, pp. 12-32, and November 1941-February 1942, pp. 133-148.)

A statement of the legal basis for invalidity and sickness benefits under the Chilean Compulsory Sickness and Invalidity Insurance Fund for persons not covered by workmen's compensation legislation, and a detailed account of the operation of the scheme from 1927 through 1940, with an analysis of the results.

English social services. By Sir George Newman. London, William Collins, 1941. 48 pp., illus.

Brief review of the development of the social services in England.

Wages and Hours of Labor

Union wages, hours, and working conditions in the building trades, June 1, 1941. Washington, U. S. Bureau of Labor Statistics, 1942. 102 pp., charts. (Bull. No. 680.)

French predecessors of Malthus: A study in eighteenth-century wage and population theory. By Joseph J. Spengler. Durham, N. C., Duke University Press, 1942. 398 pp.

Payment by results: Trade operations for which bonus rates have been fixed [Great Britain]. London, Ministry of Works and Buildings, 1942. 20 pp.

Memorandum on piece-rate wages paid under the Essential Work (Building and Civil Engineering) Order, 1941.

Some statistics of wages and hours of work [Eire] in 1941, with comparative figures for certain previous years. Dublin, Department of Industry and Commerce, 1942. 79 pp. (P. No. 5099.)

Shows wages and working hours by industry, occupation, and geographic area, and supplies a ready reckoner for conversion of hourly rates into weekly rates.

Wage incentive methods, their selection, installation, and operation. By Charles Walter Lytle. New York, Ronald Press Co., 1942. 462 pp., charts. Rev. ed.

This second revision contains a wholly new section, "Job evaluation." Wage incentive plans, it is said, are being accepted more widely than ever before. A wide variety of incentive plans and their application are analyzed and discussed.

Wartime Conditions and Policies

Labor in the war. Washington, U. S. War Production Board, Labor Division, [1942]. 7 pp.

Outlines policies governing the recruitment and allocation of workers for the war industries.

Wartime labor policies and problems in Australia. Washington, U. S. Bureau of Labor Statistics, 1942. 16 pp. (Serial No. R. 1442, reprint from March 1942 Monthly Labor Review.)

Dynamic democracy. By Francis Williams. London, Macmillan & Co., Ltd., 1941. 32 pp. (Macmillan war pamphlet No. 15.)

An account of the position of labor in Great Britain during the war.

Some aspects of British war economy. New York, New York University, Institute of International Finance, 1941. 32 pp. (Bull. No. 116.)

Describes the economic powers placed in the hands of the Government and the labor and fiscal measures adopted to gear Great Britain to war.

Wartime regulation of labor in New Zealand. Washington, U. S. Bureau of Labor Statistics, 1942. 10 pp. (Serial No. R. 1452, reprint from April 1942 Monthly Labor Review.)

Women in Industry

The employment of women in war production. Washington, U. S. Bureau of Employment Security, May 1942. 36 pp., charts; processed.

Occupations suitable for women. Washington, U. S. Bureau of Employment Security, 1942. 103 pp.

This study consists primarily of a list of occupations that may offer opportunities for the employment of women in war production. It includes occupations in selected war industries, and in nonwar industrial activities where women may be needed to fill the places left vacant by men going into the armed forces or into war production.

Guides for wartime use of women on farms. Washington, U. S. Women's Bureau, 1942. 11 pp. (Special bull. No. 8.)

Sets forth the main principles to be observed in the increased use of woman workers in agriculture during the war and also the standards of employment and housing for such workers.

Women and minors in the restaurant occupations of Rhode Island—a survey of hours, wages, and other conditions of employment. Providence, Department of Labor, 1941. Various paging, charts; mimeographed.

Recreation and housing for women war workers—a handbook on standards. By Mary V. Robinson. Washington, U. S. Women's Bureau, 1942. 40 pp., bibliography. (Bull. No. 190.)

Handbook of standards, policies, and procedure for setting up and maintaining adequate living facilities for woman war workers, designed for organizations concerned with housing and recreation for such workers.

British women at war. By Mary Cox. London, John Murray and The Pilot Press, 1941. 72 pp., illus. (Britain at war series.)

Description of the principal British women's services created to further the war effort and of the extension of the permanent women's organizations to meet the needs of the war. The work done by the women in these services and organizations is graphically described.

General Reports

Handbook of labor statistics, 1941 edition. Washington, U. S. Bureau of Labor Statistics, 1942. (Bull. No. 694; in 2 volumes.)

Annual report of Commissioner of Labor of Puerto Rico, 1940-41. San Juan, Department of Labor, 1941. 93 pp.

The report covers the fiscal year 1940-41 and summarizes the work of different branches of the Department of Labor, including the Bureau of Women and Children in Industry, Industrial Commission, Mediation and Conciliation Commission, Wage Protection and Claims Bureau, Employment Service, and Homestead Division. Includes statistics of wages and hours of labor in 1940-41, by industry.

Estadística industrial de 1939—resultados del relevamiento practicado al 31 de diciembre de 1939 [Argentina]. Buenos Aires, Dirección General de Estadística, 1942. 449 pp., charts.

Contains data from the industrial census of Argentina of December 31, 1939, showing for different geographical divisions and industries the number of salaried and wage-earning employees, by occupation, sex, and age group, and number of hours worked per week by wage earners. Some comparable figures from industrial censuses of 1935 and 1937 are included.

Memoria de la Secretaría de la Economía Nacional [México], presentada al H. Congreso de la Unión por el Secretario, F. Javier Gaxiola, Jr., Septiembre de 1940—Agosto de 1941. México, D. F., Secretaría de la Economía Nacional, 1941. 273 pp., charts.

Annual report of Mexican Secretariat of National Economy, for year ending with August 1941. It includes detailed information, with some statistics, on the development of cooperatives, and certain data on recent cost-of-living studies.

Memoria que presenta al Congreso Nacional el Ministro de Salud Pública, Trabajo y Previsión Social [Peru], Dr. Constantino J. Carvallo, 9 de Diciembre, 1939 al 28 de Julio, 1941. Lima, Ministerio de Salud Pública, Trabajo y Previsión Social, [1941?]. Various paging, illus.

Presents statistics for 1940 of industrial accidents, social insurance, and labor organizations in Peru; describes the activities of the national nutrition service, including low-cost restaurants; and gives the text of legislation relating to the work of the Ministry, enacted to July 1941.

The structure of the Netherlands Indian economy. By J. J. Boeke. New York, Institute of Pacific Relations, International Secretariat, 1942. 201 pp.

The book is divided into three parts, covering, respectively, characteristics and component factors of colonial society; economic contact between the colonial groups; vital colonial questions. Specific topics discussed include the labor market, labor requirements, and other labor matters; land tenure; share-cropping; and population problems.

Soviet economy and the war. By Maurice Dobb. London, George Routledge & Sons, Ltd., 1942. 88 pp.

Deals with the economic development of the Soviet Union, including the five-year plans, locations of industries, role of the collective large-scale State farms, activities of labor unions, and the financing of the Soviet socialized economy.

INFORMATION CENTER IN WASHINGTON

Persons coming to Washington who require information, or who are in doubt as to the proper government official or officials to contact for a discussion of their problems, will avoid confusion and save time by making use of the expanded services of the United States Information Service, conveniently located at 1400 Pennsylvania Avenue NW.

Trained information clerks are available to answer questions, and staff specialists are available for personal interviews. Telephone inquiries may be made by calling Executive 3300.

Published by the Bureau of Labor Statistics, under authority of Public Resolution No. 57, approved May 11, 1922 (42 Stat. 541), as amended by section 307, Public Act 212, 72d Congress, approved June 30, 1932. This publication approved by the Director of the Bureau of the Budget.

New Publications
United States Department of Labor

How to Order Publications

Address your order to the Superintendent of Documents, Government Printing Office, Washington, D. C., with remittance in check or money order. Currency is sent at sender's risk. Postage stamps not acceptable.

Bureau of Labor Statistics

Union wages, hours, and working conditions in the building trades, June 1, 1941. Bulletin No. 680. Price, 15 cents.

Industrial-injury statistics, by States. Bulletin No. 700. Price 15 cents.

Collective bargaining in paper and allied products industry. (Reprint from Monthly Labor Review, April 1942.) Bulletin No. 709. Price, 5 cents.

Children's Bureau

Occupational hazards to young workers: Report No. 4—Logging and sawmilling industries; Publication No. 276; price, 15 cents. Report No. 5—Woodworking machines; Publication No. 277; price, 10 cents.

Standards for day care of children of working mothers. Children in wartime No. 3. Publication No. 284. Price, 10 cents.

Women's Bureau

Office work in Los Angeles, 1940. Bulletin No. 188-2. Price, 10 cents.

Office work in Kansas City, 1940. Bulletin No. 188-3. Price, 15 cents.

Women's employment in aircraft assembly plants in 1942. Bulletin No. 192-1. Price 10 cents.

Washing and toilet facilities for women in industry. Special bulletin No. 4. Price, 10 cents.

Night work for women and shift rotation in war plants. Special bulletin No. 6. Price, 5 cents.

Hazards to women in war plants on abrasive-wheel jobs. Special bulletin No. 7. Price, 5 cents.

Guide for wartime use of women on farms. Special bulletin No. 8. Price, 10 cents.